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IN THE

Supreme Court of the United States

OCTOBER TERM, 1979

No. 79-1742

AMERICAN STERILIZER COMPANY,
Petitioner,

v.

SYBRON CORPORATION and CASTLE COMPANY,
a Division of Sybron Corporation,
Respondent.

PETITION FOR A WRIT OF CERTIORARI TO THE UNITED STATES COURT OF APPEALS FOR THE THIRD CIRCUIT

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Petitioner, American Sterilizer Company, respectfully prays that a writ of certiorari issue to review the February 4, 1980 judgment and opinion of the United States Court of Appeals for the Third Circuit entered in this proceeding.

OPINIONS BELOW

The opinion of the United States District Court for the Western District of Pennsylvania of May 24, 1974, not reported, is printed in the Appendix at page 1a, and the memorandum and order for judgment dated

January 23, 1975, is printed in the Appendix at page 8a.

The decision of the United States Court of Appeals for the Third Circuit of November 7, 1975 appears at 526 F.2d 542 and is printed in the Appendix at page 15a.

The opinion of the United States District Court for the Western District of Pennsylvania and the order for judgment of November 2, 1978, not reported, is printed in the Appendix at page 30a.

The opinion of the United States Court of Appeals for the Third Circuit of February 4, 1980 appears at 205 USPQ 97 and is printed in the Appendix at page 66a with the order denying rehearing at page 85a.

JURISDICTION

The judgment of the Court of Appeals for the Third Circuit was entered on February 4, 1980, and this petition for certiorari was filed within ninety days of the latter date. This Court's jurisdiction is invoked under 28 U.S.C. § 1254(1).

QUESTIONS PRESENTED

1. Does *Lear* v. *Adkins,* 395 U.S. 653 (1969), require payment of royalties by a licensee under an issued patent, when that licensee has replaced the patented item with a new item, refused to pay royalties on the new item, and thereafter contested the scope and validity of claims of the patent which were declared invalid when interpreted to embrace the new item?

2. Can a contractual claim for royalties prevail over federal patent policy so as to deny a licensee under an

issued patent the right to establish that a new item it manufactures does not come within the scope of the claims of the licensed patent?

CONSTITUTIONAL PROVISION INVOLVED

Constitution of the United States:

Article I, Section 8.

The Congress shall have Power . . .

> To promote the Progress of Science and useful Arts, by securing for limited Times to Authors and Inventors the exclusive Right to their respective Writings and Discoveries. . . .

STATEMENT OF THE CASE

Respondent Sybron Corporation (Sybron) now owns the McDonald patent which issued in 1962 to Castle Company (Castle), a division of Sybron.

In 1962 Amsco was marketing a product known as the Cryotherm Sterilizer. Castle claimed that the Cryotherm Sterilizer infringed its McDonald patent. The resulting dispute was resolved by a non-exclusive license agreement between Castle and Amsco under the McDonald patent.

The license agreement required Amsco to pay royalties to Castle for the sale of sterilizers equipped to practice the McDonald process as defined in the contract.

Thereafter, Amsco developed a new sterilizer known as the Medallion. Sybron, as Castle's successor, asserted that the Medallion sterilizer came within the license agreement and claimed royalties on its sale.

Denying that the Medallion process infringed the McDonald patent or came within the license agreement, Amsco refused to pay any royalties on Medallion sterilizers.

Thereafter, on December 29, 1969, Amsco filed a complaint against Sybron and Castle in the United States District Court for the Western District of Pennsylvania, seeking a judgment declaring the McDonald patent invalid and not infringed by the Medallion process.

On January 7, 1971 the parties, with the court's approval, entered into a stipulation limiting trial, at that time, to Count III of Amsco's amended complaint —that the Medallion sterilizer was not subject to the license agreement.

After a trial to the court, the district court filed its opinion on May 24, 1974 (App. 1a) holding that the Medallion process came within the license agreement and directing that judgment be entered against Amsco on Count III of the amended complaint. The court also ordered the entry of a judgment for Sybron in its counterclaim for royalties (App. 8a).

The district court prevented Amsco from challenging the validity and scope of the McDonald patent by dismissing all counts of the amended complaint except for Count III and by dismissing Amsco's motions which sought to raise validity and scope as essential issues.

The Court of Appeals for the Third Circuit reversed, holding that royalties could not be assessed against Amsco until its claims as to the scope and validity of the McDonald patent were resolved (App. 25a).

After a second bench trial, the district court declared the McDonald patent invalid under 35 U.S.C. § 103, finding no essential difference between the prior art and claims of the McDonald patent when interpreted to embrace the method of operation of Amsco's Medallion sterilizer.

The district court nevertheless awarded Sybron contractual royalties under the patent licensing agreement until the filing of the Declaratory Judgment action. The district court held that the Supreme Court's decision in *Lear* v. *Adkins, supra,* permitted such a royalty award even though the patent was declared invalid.

Amsco filed timely motions with the district court for a decision on the scope of the licensed McDonald patent and to amend judgment; those motions were denied.

Notice of appeal was filed to the Third Circuit Court of Appeals from the judgment in the second bench trial. Amsco also filed a motion requesting remand to the district court with directions to decide the issue of scope of the licensed McDonald patent. The Court of Appeals delayed decision on such motion pending argument.

In its appeal from the second bench trial, Amsco requested the Court of Appeals to decide the scope issue, based on the district court's findings that claims of the McDonald patent were invalid when interpreted to cover the Medallion sterilizer process.

The Court of Appeals for the Third Circuit affirmed the district court's finding of invalidity of the licensed McDonald patent under 35 U.S.C. § 103 and also af-

firmed the award of contractual royalties (for the period of time prior to the filing of suit, as a breach of contract claim) while refusing to decide the scope of the patent claims of the McDonald patent.

Amsco petitioned for a rehearing en banc, but that petition was denied by the Court of Appeals for the Third Circuit on March 10, 1980 (App. 85a) and judgment entered.

REASONS FOR GRANTING THE WRIT

1. The Decision Below Is in Conflict With This Court's Decision in *Lear* v. *Adkins*, 395 U.S. 653 (1969)

The decision below forces a licensee to pay contractual royalties (for a period of time prior to filing suit) in the "most typical situation" described by *Lear* v. *Adkins, supra,* involving licensing after issue of the patent and, under circumstances where claims of the licensed patent were found to be invalid when interpreted to cover a method used by licensee to replace the patented method. Such an award of royalties is contrary to the spirit of this Court's decision as expressed in *Lear* v. *Adkins, supra,* that a licensee should be "freed from liability at least from the time he refuses to pay the contractual royalties"[1] rather than being forced to pay royalties.

The decision below requires payment of royalties for a period prior to the filing of the Declaratory Judgment action, notwithstanding that the claims of

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[1] This Court stated in *Lear* v. *Adkins, supra,* at page 674, that: . . . . If a licensee has reason to believe that he will replace a patented idea with a new one in the near future, he will have little incentive to initiate lengthy court proceedings, unless he is freed from liability at least from the time he refuses the pay the contractual royalties.

the McDonald patent on which royalties were based were found to be invalid when interpreted to cover the method of operation of Amsco's Medallion sterilizer.[2]

The result obtained below cannot be reconciled with the federal patent policy as enunciated in *Lear* v. *Adkins, supra.* The statement of the "problem" quoted by the court below (App. 80a) "How much of the law of contracts and patents must fall in order to give licensees sufficient encouragement to challenge (the validity of a patent)?", conflicts with the statement in *Lear* v. *Adkins, supra,* page 671 "We think it plain that the technical requirements of contract doctrine must give way before the demands of the public interest in the typical situation involving the negotiation of a license after a patent has issued".

Also, the case cited by the Third Circuit Court of Appeals, *PPG Industries, Inc.* v. *Westwood Chemical, Inc.,* 530 F.2d 700 (1976 CCA-6), awarded contractual royalties before filing of suit under the special facts and circumstances presented in that case in which licensee had attacked validity of the licensed patent only collaterally after the patent had been declared invalid in a suit against a third party in which licensee had actively assisted the licensor in attempting to uphold validity.

The decision below directly impairs the incentive for a licensee, who has replaced a patented idea with a

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[2] The district court, although declaring the McDonald patent invalid, nevertheless awarded Sybron $112,206 on its counterclaim against Amsco for royalties under the licensing agreement allegedly due on sales of Medallion sterilizers up until the filing of the present action. The district court held that the Supreme Court's decision in *Lear* v. *Adkins, supra,* permitted such a royalty award even though the patent was declared invalid.

new one, to initiate lengthy court proceedings to challenge validity; indeed, the decision below establishes a liability, rather than freeing the licensee from liability, at least from the time he refuses to pay contractual royalties.

2. The Decision Below Allows Contract Language to Prevent a Patent Licensee From Establishing Conflict With Federal Patent Policy

The decision below affects all licensing contracts of issued patents which include royalty-bearing provisions. It has the effect of encouraging patentees to assert contract claims for royalties without reference to the state of the prior art. In accordance with the decision below, royalties will be awarded at least for the period of time prior to filing suit, notwithstanding that claims of the licensed patent are found to be invalid when interpreted to cover the subject matter asserted as royalty bearing.

The decision below prevents a patent licensee from establishing that a new item it manufactures does not come within the scope of a licensed patent. The effect of that decision is to reinstate a licensee estoppel [3] to

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[3] Under this Court's decision in *Scott Paper Co.* v. *Marcalus Manufacturing Co.*, 326 U.S. 249 (1945), a patent licensee was permitted to rely on the prior state of the art to narrow the scope of a licensed patent in order to avoid payment of contractual royalties; such use of prior art evidence was permitted even though the licensee was estopped, at that time, from contesting the validity of the licensed patent.

The decision in *Lear* v. *Adkins, supra,* discarded any aspect of the licensee estoppel doctrine which had prevented a licensee from contesting the validity of the licensed patent and stated that in *Scott Paper Co.* v. *Marcalus Manufacturing Co., supra,* this Court ". . . adopted a position . . . undermining the basis of patent

prevent a patent licensee from relying on the prior art to narrow the scope of the licensed patent and avoid royalties.

The court below refused to remand for a decision, or to rule on, the scope of the licensed patent in view of the prior art.

The award of royalties is in conflict with and significantly limits application of the federal patent policy favoring free competition in ideas in the public domain; the effect is to permit state law and the parties' contract to take precedence in a patent licensing situation where federal patent law should be pre-emptive.

As stated by this Court in *Graham v. John Deere Co.*, 383 U.S. 1 (1966), at pages 5 and 6:

> " . . . the federal patent power stems from a specific constitutional provision which authorizes the Congress 'To promote the Progress of . . . useful Arts, by securing for limited Times to . . . Inventors the exclusive Right to their . . . Discoveries . . .' (Art. I, § 8). The clause is both a grant of power and a limitation. This qualified authority . . . is limited to . . . advances . . . Congress in the exercise of the patent power may not overreach the restraints imposed by the stated constitutional purpose. Nor . . . enlarge the patent monopoly . . . remove existent knowledge from the public domain, or . . . restrict free access to materials available."

These restraints of the federal patent system are likewise imposed on parties to a licensing contract

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estoppel (which had prevented licensee from narrowing the scope of a licensed patent) even more than *Formica (Westinghouse Electric and Mfg. Co.* v. *Formica Insulation Co.*, 266 U.S. 342 (1924)) had done".

and prohibit expansion of a patent grant beyond what is lawfully patentable by an award of contractual royalties, unlimited by the prior art, under a licensing agreement entered into after issue of a patent.

CONCLUSION

For the foregoing reasons, a writ of certiorari should issue to review the judgment and opinion of the Court of Appeals for the Third Circuit.

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[4] ". . . it may be suggested that although Lear must be allowed to raise the question of patent validity in the present lawsuit, it must also be required to comply with its contract and continue to pay royalties until its claim is finally vindicated in the courts.

"The parties' contract, however, is no more controlling on this issue than is the State's doctrine of estoppel, which is also rooted in contract principles." (*Lear* v. *Adkins*, *supra*, p. 673)

APPENDIX

OPINION

WILLSON, Senior District Judge

In this civil action, plaintiff filed a complaint for declaratory judgment. The complaint consisted of 5 counts. Thereafter, defendant filed what it styled a first set of motions; that is, motions to dismiss, to strike, for summary judgment, for more definite statement, and for an order granting defendant costs, expenses, and reasonable attorneys fees.

With the filing of the foregoing extensive set of motions, it became immediately apparent that considerable discovery, arguments, and briefing were in sight before the nub of the controversy was reached. Counsel were heard on various motions, but it was then decided that an amended complaint would suffice to move the case along.

The amended complaint was filed May 25, 1970. The parties to this law suit each manufacture and distribute gas sterilization apparatus used in modern hospitals. Defendant owns the McDonald Patent. But for many years prior to 1957, plaintiff AMSCO made and sold gas sterilizers independent of any equipment made by defendant's predecessor, Castle. But defendant claimed that the Medallion Cycle infringed the McDonald Patent and threatened suit unless AMSCO paid royalties. AMSCO's counsel say that AMSCO never believed that the McDonald Patent disclosed anything that was new, but in order to avoid a lawsuit AMSCO accepted the license, dated July 22, 1964, which for brevity and clarity is attached hereto and marked Appendix A.

In Count I of the amended complaint, plaintiff alleges that the McDonald Patent is invalid. In Count II, plaintiff claims that the McDonald Patent does not cover its Medallion Cycle. In Count III, plaintiff alleges that its Medallion Cycle is not covered by the licensed contract with the defendant.

As the case moved along, it was, of course, apparent that plaintiff desired to test the validity of the McDonald Cycle even though it had a license agreement thereunder. The validity issue was, of course, resisted by defendant. It asserted the general rule that the licensee cannot charge invalidity of the patent on which he has agreed to pay royalties. It is apparent also that plaintiff sought some method to avoid the license agreement, Appendix A. Its counsel has said in one of its briefs that:

> "Since it appeared to Amsco that the McDonald patent disclosed nothing new at the time the agreement was entered, and particularly since Merriam Patent No. 2,088,179 appeared to disclose everything claimed in the McDonald patent, a definition was placed in the contract of what would be considered to be covered by the patent.
>
> "Castle has attempted to construe this definition as covering a broader scope than the terms of the patent claims themselves, as appears from the correspondence attached to Castle's Exhibit B-5 and by the fact that Castle in its Answer is attempting to rely on the contract to determine what is covered by the McDonald patent and not to rely on the McDonald patent, which in itself constitutes a misuse under the decided cases.
>
> "When the decision of the Supreme Court of the United States in Lear v. Adkins was handed down and when Castle was threatening to sue Amsco for royalties on the Medallion sterilizer (Ex. B-41), Schovee letter of December 4, 1969), Amsco decided to ask the Court to rule on the question of whether the Medallion sterilizers were covered by the McDonald patent and, at the same time asked the Court to rule on the validity of the McDonald patent itself. Plaintiff also asked the Court to rule that Defendant had violated Section 2 of the Sherman Act."

As plaintiff's contentions were considered, it became apparent that the contract issue should be first litigated. If plaintiff's Medallion Cycle is not within the terms of the license, then the royalty issue is ended. But if in turn the plaintiff's Medallion Cycle or Apparatus is within the terms of the license agreement, then it must pay royalties and otherwise abide by the license contract.

Thus after some discussion, counsel came before the Court on Jan. 7, 1971, with a stipulation prepared by them, which was approved by the Court and which set forth ths issue to be tried by this Court at this stage.

Paragraph 7 of the stipulation reads:

> "7. The sole issue to be tried at this time by the Court is whether the plaintiff's Medalion Cycle comes within the aforesaid license agreement without prejudice to either party to the raising of other issues following the disposition by the Court of this issue."

Thereafter, on February 5, 1971, defendant filed a responsive answer and counterclaim, and in due course the case came on for trial. Thereafter, counsel have been heard at oral argument, and they have filed proposed Findings and Conclusions and extensive briefs. This Court now is to decide whether the equipment made and sold by plaintiff, known as the Medallion Cycle or Process, is within the license agreement of July 22, 1964.

In a discussion of the trial issues, as the Trial Judge, it is readily admitted in the first instance that the gas sterilization processes were difficult to comprehend when considering pleadings, motions, briefs, and oral arguments. But, however, the visual inspection at the AMSCO manufacturing establishment at Erie clarified the uncertainties, which were in the Court's mind prior to the plant visit. Trial testimony was taken on two occasions at the AMSCO manufacturing establishment. The older apparatus used

by AMSCO at the time it signed the license contract under the McDonald Patent was exhibited and examined and explained by expert testimony. At the same time adjacent to the McDonald machine, plaintiff had set up its Medallion Cycle sterilizing apparatus. Its operation was examined and expert testimony received in explanation of the differences of the two pieces of equipment. There is no question but what plaintiff's Medallion Cycle is the more sophisticated piece of equipment than the older McDonald equipment. In conceding that the Medallion Cycle is advanced in the art over and above the McDonald Patent claims, is it nevertheless, a part of the same principle covered by the license contracts even though it may be an improvement over the original McDonald Process?

At this point it is well to know the posture the plaintiff is in with respect to the issues in this case. It has the usual civil action in which it must prevail by the fair preponderance of the evidence. That means that it must show by a preponderance of the evidence that its Medallion Cycle is not within the infringing definitions of the license contract. It has said that it agreed to the royalty payments even though it has believed that the McDonald Patent disclosed nothing new, but this Court will not relieve it from an obligation on that ground. It is to be emphasized that the license contract, Appendix A, can be terminated at will by plaintiff by payment of royalties due to the termination date. It may then test the validity of the McDonald Patent. It could have done so prior to July 22, 1964, but it chose the license instead of a lawsuit. Throughout this case this Court has had the strong impression that plaintiff wishes to test the claims of the McDonald Patent with the infringement definitions in the license agreement, its theory being that the license agreement can rise no higher than the McDonald Patent. But in the Court's view, if plaintiff's Medallion Cycle performs the same functions or methods as outlined in Paragraphs 1, 2, and 3 of the

definitions of the infringement method of contract, then plaintiff cannot escape the provisions of the contract.

It is to be emphasized also in this case that Paragraph 9 of the license agreement says:

> "So long as this Agreement remains in effect, AMSCO acknowledges the validity of said patents."

The license agreement involves contract law.

In a rather similar situation, Chief Judge John R. Brown of the Court of Appeals in the Fifth Circuit in *U. S. Industries, Inc.* v. *Camco, Incorporated,* 277 F.2d 292, 294, said:

> [1] While the problem is one of construction of a contract—a patent license, for which the usual principles of contract law control, Storm v. United States, 5 Cir., 1957, 243 F.2d 708, 710, 711; 69 C.J.S. Patents § 249 —the patent is of interest. For the patent and the 1947 controversy over it was the precipitating subject of the contract. Lest some small kernel be picked up and then by the tender, imaginative nurture of counsel be germinated into a full flower of truth as an authoritative construction and interpretation by us of King 487, we emphasize that our description of the patent, the novelty of its solutions, the meaning or limitation of its several claims has no such purpose. Our capsulated summary with all of the attending inaccuracies, is merely to give some understanding to the text and context of this contract and the nature of the present controversy of whether particular devices are within the scope of the license grant."

This Court has considered the McDonald Patent claims as background and, of course, that patent precipitated the original controversy and was the reason why plaintiff chose a license agreement rather than a lawsuit. But is

seems to this Court that it is plain that the crux of each of the processes, that is, both under McDonald and under Medallion, the dwell period is crucial. Each process is designed to provide a dwell period at a selected humidity level in order to properly condition the load, this, of course, after the chamber is evacuated to a selected level. Steam or water vapor is introduced to humidify the chamber. There is some difference in the McDonald and Medallion systems with respect to the dwell period being fixed in the former whereas in Medallion there is a continuous introduction of steam; nevertheless there is a dwell period in each. The purpose of that period is to permit proper diffusion of the moisture into the object being sterilized.

The Court has not overlooked the fact that in the sterilization process the McDonald system generally is a step-by-step process and that the Medallion Cycle is a continuous flow process. These differences are noted in Appendix B. But as indicated heretofore, it is believed that the Medallion Cycle is simply a more sophisticated operation than that set out in the McDonald Patent claims. But the Medallion Cycle contemplates the 3 infringed methods in the license contract which the parties executed.

This Court has concluded that the plaintiff has failed to prove its case by a fair preponderance of the evidence. Each party has filed extensive Findings of Fact and Conclusions of Law. For the purpose of this case, the proposed Findings of Fact and Conclusions of Law submitted by defendant's counsel and filed with the Clerk on February 6, 1974, are adopted as the Findings and Conclusions of this Court on the issue tried, which is encompassed in Count III of the amended complaint. The Court concluding that the plaintiff is bound by the license agreement, defendant is entitled to recover its royalties.

Judgment is directed to be entered against plaintiff on Count III of the amended complaint. Judgment is directed to be entered in favor of the defendant on its counterclaim.

The amount of the judgment to be entered is to be hereafter determined unless agreed upon.

IT IS SO ORDERED.

this 24th day of May 1974.

/s/ JOSEPH P. WILLSON
Joseph P. Willson
Senior District Judge

MEMORANDUM AND ORDER FOR JUDGMENT

In the Opinion filed May 24, 1974, after trial, it was decided that defendant was entitled to royalties under the contract between the parties, dated July 22, 1964. Plaintiff had filed a complaint for declaratory judgment. The case is a protracted one. It is believed that the issues and evidence now require that a final judgment be entered. The delay in the final judgment is the result of the difficulty in determining the amount due defendant under its counterclaim. Since the previous opinion, the parties have undergone extensive discovery, and plaintiff has had an audit of defendant's records. As evidentiary hearing has been held, and as a result of the hearing before me on the royalty issue, I accept Amsco's admission that under my previous decision, assuming that to be correct, it owes royalties in the aggregate sum of $469,409.00. Interest is awarded on the principal sum at 6% per annum running quarterly on the various amounts due and computed to January 23, 1975, is the sum of $91,099.00.

It should be stated that defendant is not entirely satisfied with the amount of royalties which the Court believes had been proven. Defendant has been required to show the amount due by a fair preponderance of the evidence. A large part of this evidence must come from the records of plaintiff. But from the testimony this date, particularly of James B. Krahe, as well as the other evidence, the amount tendered by plaintiff must be taken as correct. As the transcript will show, what counsel have designated categories of sterilizers Nos. 1 through 5, in my view, are not subject to royalties under the contract, the reason being that these sterilizers are not within the definition of infringement specified in the contract. They are not equipped with the apparatus which produces the Medallion Cycle. Defendant in the counterclaim strongly contends that any component parts, which might be added to a sterilizer, marketed by Amsco previous to its adoption of its Medal-

lion Cycle sterilizer, should carry royalties. But the license agreement says nothing of parts or any addition to any previously-sold sterilizer. There were many of the older sterilizers on the market at the time of the contract. The parties must have foreseen that perhaps improvements in the devices operating the sterilizers would be made from time to time. But only the original equipment was mentioned in the license agreement. The sterilizers sell generally from a few to many thousands of dollars each. The contract at page 4, first paragraph, requires Amsco to pay royalties on sterilizers "equipped with control mechanism adapted to carry out the said 'Infringing Method', ..." The infringing method is carefully defined. This Court must conclude that the parties are bound by exactly what they contracted for, and any additions or controls, which might convert previously-sold sterilizers to more sophisticated sterilizers, are not within the terms of the contract and require no royalty payment. Under all the evidence, therefore, the amount of the judgment to be entered on the counterclaim is $560,508.00.

Many and various other motions have been filed throughout the long history of this case. But the case came to trial under the amended complaint for declaratory judgment. In Count 1, it is averred that the McDonald Patent is invalid, and in Count 2, it is averred that the McDonald Patent does not cover the Medallion Process. In Count 3, it is averred that the Medallion Process is not covered in the contract with defendant. Count 3 was the issue tried, and it is a basis of the instant judgment. It should be mentioned again that a stipulation of counsel approved by the Court and filed January 7, 1971, reads in Paragraph 7, as follows:

> "7. The sole issue to be tried at this time by the Court is whether the plaintiff's Medallion Cycle comes within the aforesaid license agreement without prejudice to

> either party to the raising of other issues following the disposition by the Court of this issue,"

and was the issue determined in the instant trial and decided against plaintiff. But there could be no final judgment on that issue decided against plaintiff until the damages were computed under the counterclaim. This has been done. But following that trial and decision entered May 24, 1974, plaintiff renewed its motions to proceed to try the validity issues in Counts I, II, and IV, as raised in the Amended Complaint, all to the effect that the previous McDonald Patent is invalid and not infringed by plaintiff's Medallion Process. On the other hand, defendant has moved for summary judgment with respect to those counts other than Count III. My disposition of the validity counts issue is that all validity counts of the Amended Complaint are dismissed, but it is to be understood that there is no adjudication on the merits of any issue raised in these dismissed counts.

Likewise, plaintiff's motion filed as late as October 23, 1974, over 4½ years from the time the case commenced, to again amend the complaint, is dismissed, but without any adjudication on the merits. It is believed that my decision requires a short comment.

There is no doubt that the decision of the Supreme Court in *Lear, Inc. v. Adkins,* 395 U.S. 653, decided June 16, 1969, spawned this litigation. The complaint in this case was filed six months and thirteen days after that decision came down, and it is the first case cited by plaintiff's counsel in discussion of the law on this subject. Many other decisions of the Courts of Appeal, as well as the District Courts, have been referred to throughout this litigation. However, I have not found any decision squarely in point on the facts in the instant case. I am continually impressed that plaintiff in this civil action does not wish to assume any risk on the validity issue. My reasons why

the *Lear* decision does not rule the instant litigation are as follows:

I. Reasons Why Lear Does Not Rule Amsco

1. McDonald Patent issued December 11, 1962; Amsco License Agreement, dated July 22, 1964. Amsco had some 19 months to examine the validity of the McDonald Patent, and at no time contested its validity.

2. The issue here is between two corporate entities, which voluntarily executed a license agreement under the patent after it was granted.

3. In *Lear,* the patent was not issued until January 5, 1960. During the long period that Adkins was attempting to secure his patent, Lear came to the conclusion and announced that it had found a patent, which anticipated Atkins' discovery and Lear refused to pay royalties and renounced the contract. As the Courts have said, *Lear* contested the validity of this patent from the outset, even before it was issued.

4. Lear had no escape clause, i.e., the right to terminate, as was in the Amsco License. Judge Swygert in *Ransburg Electro-Coating Corp. v. Spiller & Spiller, Inc.,* 489 F.2d 974, 977, says:

> "The only thing decided in *Lear* was that a licensee in that situation would be relieved from the liability of paying royalties during the time he is challenging the validity of the patent."

The same Judge, earlier, in *Beckman Instruments, Inc. v. Technical Develop. Corp.,* 433 F.2d 55, 57, in a "package" sublicense agreement entered into prior to a patent, held that the licensee could contest validity on its refusal to recognize the patent and pay royalties thereunder. *Beckman* was not bound by the doctrines of patent misuse and licensee estoppel.

5. Amsco is not muzzled. In *Lear*, the Supreme Court says in 395 U.S. 653, 670; pg. 58, in 433 F.2d 55:

   "'Licensees may often be the only individuals with enough economic incentive to challenge the patentability of an inventor's discovery. If they are muzzled, the public may continually be required to pay tribute to would-be monopolists without need for justification.'"

   Amsco could terminate the license on 30 days' notice in writing to defendants and payment of royalties, and, thereafter, according to the contract, "shall stand in the position as to the said patents covered by this Agreement as though this Agreement had not been made." [§ 10].

6. In this case, the parties agreed to try the issue raised in Count Three of the complaint, which averred that Amseo's Medallion Process is not covered in the contract. Had that issue been decided for plaintiff, this litigation would have ended. This issue was tied also to the stipulation that neither party would be prejudiced to pursue other rights regardless of the outcome of the Count Three issue. At this stage, plaintiff seeks to try the validity issue, but this Court must emphasize that plaintiff has not as yet terminated the license agreement, which it has the right to do under the Tenth Paragraph.

7. The public policy expressed in *Lear* that the licensee be allowed to challenge patent validity and escape payment of royalties, if applied to Amsco, would give it an inequitable and unconscionable advantage in this case. For instance, it paid royalties for several years. It has not yet repudiated the license. In the cited cases following *Lear*, the licencees have exposed themselves to the risks of injunction because of infringement. In this case, Amsco has attempted to avoid all

risks whatsoever, but Amsco says it Medallion Process is novel and different than the McDonald Process under which it took the license. Under all the facts and circumstances in this case, the Court believes the rule is correctly expressed in *Bahamas Paper Co., Ltd. v. Imperial Packaging Corp.*, 58 F.R.D. 355, 357, where Judge Knapp says:

> "[2] It seems to me that the rule should be that the licensee is relieved of his obligation to pay royalties the moment he effectively repudiates the license agreement, thus forswearing its 'fruits' and exposing himself to the risks of injunction proceedings or other legal action by his licensor."

At the last hearing held today, January 23, 1975, the Court inquired of plaintiff's counsel as to whether it has terminated the license agreement. Plaintiff's counsel was informed that, if it had terminated the license agreement, then the motion to amend the Amended Complaint, filed October 23, last, would be granted, and we would proceed to try validity. Nevertheless, plaintiff's counsel persists in the contention that under the facts of this case plaintiff is entitled to try validity even though it has not repudiated the license. It is the view of this Court that plaintiff's position is untenable. The legal principle enforced for many years that a licensee cannot challenge the validity of the patent under which he holds his license has application in this case and is the reason for the dismissal of all counts in the Amended Complaint except Count III.

ORDER FOR JUDGMENT

Under the evidence for the reasons stated in the Opinion of May 24, 1974, and the Memorandum this date, it is ORDERED AND ADJUDGED as follows:

1. All Counts of the Amended Complaint are dismissed except Count III.

2. On the counterclaim:

   Judgment is Directed in favor of the defendant and against the plaintiff in the sum of $560,508.00, which is the principal sum with interest computed to date.

   Interest on the principal sum of $469,409.00 is to run at the rate of 6% per annum until paid.

3. The many and various motions heretofore filed in this civil action are dismissed.

4. An appeal of this Judgment by plaintiff within 30 days of the date of entry is a supersedeas.

IT IS SO ORDERED this

23rd day of January 1975.

/s/ JOSEPH P. WILLSON
Joseph P. Willson,
Senior District Judge

cc: John F. Potter, Esq.
Paul T. O'Neill and Ray Baker, Esqs.
John G. Gent, Esq.
John R. Schovee, Esq.

UNITED STATES COURT OF APPEALS, THIRD CIRCUIT

Nos. 75-1305, 75-1306

AMERICAN STERILIZER COMPANY,
Appellant in No. 75-1305,

v.

SYBRON CORPORATION and Castle Company,
a Division of Sybron Corporation,
Appellants in No. 75-1306.

Argued September 18, 1975.

Decided November 7, 1975.

Patent licensee brought action seeking declaration that patent was invalid and that newly devised process did not infringe patent in which licensor filed counterclaim seeking an accounting of royalties due. The United States District Court for the Western District of Pennsylvania, Joseph P. Willson, J., entered a judgment for licensor on its counterclaim, and appeal was taken. The Court of Appeals, Garth, Circuit Judge, held that failure of licensee which obtained license after issuance of patent to exercise termination provision in licensing agreement did not preclude licensee from attacking validity of patent; and that licensee was not required to pay royalties during pendency of action challenging the patents validity.

Reversed and remanded.

John F. Potter, Erie, Pa., Paul T. O'Neil, Raymond N. Baker, Washington, D.C., for American Sterilizer Co.;

Whether in a case of fully concurrent jurisdiction—for example, a claim under the Securities Act of 1933, 15 U.S.C. §77v (a)—a stay of the federal case which deprives a litigant of the choice of a federal forum would be proper in light of *McClellan* v. *Carland, supra,* is an issue we do not here decide.

Thomas R. Boland, Shanley, O'Neil & Baker, Washington, D.C., MacDonald, Illig, Jones & Britton, Erie, Pa., of counsel.

John G. Gent, Erie, Pa., John R. Schovee, Rochester, N.Y., for Sybron Corp. and Castle Co.; Schovee & Boston, P.C., Rochester, N.Y., Quinn, Gent, Busick & Leemhuis, Erie, Pa., of counsel.

GARTH, Circuit Judge.

May a patent licensee challenge the scope and validity of the underlying patent without first terminating its license agreement? The district court answered this question in the negative by holding that the licensee's failure to exercise the termination provision in the agreement prevented an attack upon the underlying patent. We reverse, holding that *Lear, Inc. v. Adkins,* 395 U.S. 653, 89 S.Ct. 1902, 23 L.Ed.2d 610 (1969) controls.

I. FACTS

Each of the parties to this action manufactures and sells gas sterilization apparatus used in modern hospitals. Defendant Sybron Corporation (Sybron), a New York Corporation, owns the McDonald patent [1] which was issued in 1962 to Castle Company (Castle), a division of Sybron. For many years prior to 1962, plaintiff American Sterilizer Company (Amsco), a Pennsylvania corporation, made and sold gas sterilizers independent of any equipment made by Castle.

In 1962 Amsco was marketing a product known as the Cryotherm Sterilizer. Castle claimed that the Cryotherm Sterilizer infringed upon its McDonald patent. As a result of this dispute, Amsco, on July 22, 1964, entered into a nonexclusive license agreement with Castle under the McDonald patent.

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[1] United States Patent No. 3,068,064 and Canadian Patent No. 664,895.

The license agreement required Amsco to pay royalties to Castle for the sale of sterilizers equipped with the McDonald process as defined in the contract. During the existence of the license, Amsco "acknowledge[d] the validity of said patents." In addition, the termination provisions of the agreement provided in paragraph 10 that

> Amsco may terminate this agreement on thirty (30) days notice in writing to Castle and payment in full of the accrued royalty and thereafter Amsco shall stand in the same position as to the said patents covered by this Agreement as through this Agreement had not been made.

Thereafter, Amsco developed a new sterilizer known as the Medallion. Sybron, as Castle's successor, asserted that the Medallion process came within the license agreement and claimed royalties due on its sale. Denying that the Medallion process infringed the McDonald patent or came within the license agreement, Amsco refused to pay any royalties, thereby giving rise to this action.

II. PROCEDURAL HISTORY

On December 29, 1969 Amsco filed its original complaint against Sybron and Castle in the United States District Court for the Western District of Pennsylvania.[2] Among other relief sought was a judgment declaring the McDonald patent invalid and a judgment that the Medallion process did not infringe the McDonald patent. Thereafter, in order to obtain additional relief, Amsco amended its complaint seeking a declaration that the Medallion process was outside the scope of the 1964 license agreement. The amended complaint, filed on May 25, 1970, accordingly alleged in Count I that the McDonald patent was invalid, in Count II that the McDonald patent did not cover the Medallion

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[2] References hereafter to Sybron shall be deemed to include Castle.

process, and in Count III that the Medallion process did not come within the license agreement.[3] At all times, up to and including the present, Amsco has refused to terminate the license agreement as provided in paragraph 10 of that agreement. (*See* pp. 543-544, *supra.*)

On January 7, 1971 the parties, with the court's approval, entered into a stipulation limiting trial, at that time, to the third count of Amsco's amended complaint—that the Medallion sterilizer was not subject to the license agreement. The stipulation provided that

> [t]he sole issue to be tried at this time by the Court is whether the plaintiff's Medalion [sic] Cycle comes within the aforesaid license agreement without prejudice to either party to the raising of other issues following the disposition by the Court of this issue.

Following the stipulation Sybron, without answering the first two counts of Amsco's amended complaint, answered Count III. In its answer Sybron claimed by way of counterclaim that it was entitled to a full accounting for all royalties due on the sale of Medallion sterilizers. Amsco answered the counterclaim by asserting as affirmative defenses the same two claims as appear in the first two counts of its amended complaint, i.e., a challenge to the patent's validity (Count I) and to the patent's scope (Count II).

After a trial to the court, the district court filed its opinion on May 26, 1974 holding that the Medallion process came within the license agreement and directing that judgment be entered against Amsco on Count III of the amended complaint. The court also ordered the entry of a judgment for Sybron on the counterclaim in an amount to be determined after a hearing on damages.

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[3] Amsco asserted jurisdiction as to Count I and II udner 28 U.S.C. § 1338 (patent) and as to Count III under 28 U.S.C. § 1332 (diversity). The facts establishing the parties' citizenship were stipulated in the January 7, 1971 stipulation.

From May, 1974 to January, 1975, Amsco, through various motions, attempted on at least three different occasions to raise the issues of the patent's validity and scope. These attempts were unavailing, as all of Amsco's motions were dismissed by the court's order of January 24, 1975. That order also dismissed all counts of the amended complaint except Count III and granted Sybron a judgment on its counterclaim in the amount of $560,508, consisting of the principal sum of $469,409 for royalties due and interest to January 23, 1975.[4]

Amsco appeals from the entire judgment of January 24, 1975. Sybron appeals from so much of the judgment as pertains to damages, claiming that the court erred in its calculations. Our jurisdiction is predicated upon 28 U.S.C. § 1291.

III. APPLICABILITY OF THE LEAR DOCTRINE

The district court prevented Amsco from challenging the validity and scope of the McDonald patent. It achieved this result by dismissing all counts of the amended complaint except for Count III and by dismissing Amsco's motions which sought to raise validity and scope an essential issues.

The district court explained in its January 23, 1975 opinion:

> At the last hearing held today, January 23, 1975, the Court inquired of plaintiff's counsel as to whether it has terminated the license agreement. Plaintiff's counsel was informed that, if it had terminated the license agreement, then the motion to amend the Amended

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[4] Although the January 24, 1975 order recites that interest to January 23, 1975 has been included in the award of $560,508, the parties and the court recognized that interest had been computed only to September 30, 1974. In the event that Sybron prevails on remand, royalties, if any, and interest should be calculated to the appropriate date.

> Complaint, filed October 23, last, would be granted, and we would proceed to try validity. Nevertheless, plaintiff's counsel persists in the contention that under the facts of this case plaintiff is entitled to try validity even though it has not repudiated the license. It is the view of this Court that plaintiff's position is untenable. The legal principle enforced for many years that a license [sic] cannot challenge the validity of the patent under which he holds his license has application in this case and is the reason for the dismissal of all counts in the Amended Complaint except Count III.

The court's reliance upon the doctrine of licensee estoppel —that a patent licensee cannot challenge the underlying patent during the term of the license—would require, if we agreed with the district court, a holding that *Lear, Inc. v. Adkins,* 395 U.S. 653, 89 S.Ct. 1902, 23 L.Ed.2d 610 (1969) does not rule the instant litigation.

In *Lear, Inc. v. Adkins, supra,* the Supreme Court granted review of a state court judgment to consider whether a patent licensee could allege patent invalidity as a defense to the licensor's suit for royalties. The state court had held, under the doctrine of licensee estoppel, that the licensee was estopped from attacking the patent during the term of the license. *Adkins v. Lear, Inc.,* 67 Cal.2d 882, 64 Cal.Rptr. 545, 435 P.2d 321 (1968) (in banc). The Supreme Court issued a writ of *certiorari* in *Lear* to resolve the conflict between the state doctrine of estoppel and the federal policy of "free competition in ideas which do not merit patent protection." *Lear, Inc. v. Adkins, supra* 395 U.S. at 656, 89 S.Ct. at 1904.

As a matter of federal patent policy, the Court in *Lear* overruled its prior adherence to the rule that a license "may not challenge the validity of the licensed patent in a suit for royalties due under the contract." *Automatic Radio Manufacturing Co. v. Hazeltine Research, Inc.,* 339 U.S.

827, 836, 70 S.Ct. 894, 899, 94 L.Ed. 1312 (1965). In reaching this decision the Court stated:

> Surely the equities of the licensor do not weight very heavily when they are balanced against the important public interest in permitting full and free competition in the use of ideas which are in reality a part of the public domain. Licensees may often be the only individuals with enough economic incentive to challenge the patentability of an inventor's discovery. If they are muzzled, the public may continually be required to pay tribute to would-be monopolists without need or justification. We think it plain that the technical requirements of contract doctrine must give way before the demands of the public interest in the typical situation involving the negotiation of a license after a patent has issued.

Lear, Inc. v. Adkins, supra 395 U.S. at 670-671, 89 S.Ct. at 1911. Thus the Court held that the paramount federal policy of allowing "full and free competition in the use of ideas which are in reality a part of the public domain" required rejection of the doctrine of license estoppel where the license agreement followed the issuance of the patent.

The instant controversy represents the "most typical situation" analyzed by the Supreme Court in *Lear*. Here, Amsco obtained its license after the McDonald patent issued.[5] At the time this dispute arose Amsco had not terminated the license agreement. Although the licensor, Sybron, did not sue the licensee, Amsco, as was the case in *Lear*, we find no significance in this procedural differ-

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[5] In *Lear*, in contrast to the typical situation analyzed, the license agreement was executed before the patent issued. Although the Supreme Court found this a more complex estoppel problem, it concluded, as it had with respect to the most typical situation, that overriding federal policy required a rejection of the license estoppel doctrine in both situations.

ence.[6] Amsco in the course of this litigation has consistently alleged that the McDonald patent is invalid and that therefore the McDonald process is part of the public domain of ideas. Under this circumstance, the "technical requirements of contract doctrine must give way before the demands of the public interest"[7] in testing the validity of the monopoly granted by the federal patents laws.

We cannot agree with Sybron's attempts to distinguish this case from *Lear*. Sybron contends that Amsco's right to terminate the licensee under paragraph 10 of the License Agreement ensures that Amsco cannot be "muzzled." In *Lear* the Court reasoned that a licensee may be the only one with sufficient interest to challenge the inventor's discovery. If the doctrine of licensee estoppel prevented the licensee's challenge, i.e., muzzled th licnsee, the public might suffer by paying "tribute to would-be monopolists without . . . justification." *Lear, Inc. v. Adkins, supra* at 670, 89 S.Ct. at 1911. However, Sybron argues that the policy considerations in *Lear* for rejecting licensee estoppel are not applicable here. It bases this argument on an assumption that the licensee in *Lear* was *unable* to terminate its license. We find that assumption to be erroneous.

Although the United States Supreme Court did not discuss the provisions of the *Lear* license agreement, the state court opinion did. The Lear-Adkins license contained two clauses permitting termination of the license by Lear. Furthermore, the state court expressly found that Lear had failed to terminate the license in accordance with the applicable terms. *Adkins v. Lear, Inc.*, 64 Cal.Rptr. 545,

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[6] The Sixth Circuit similarly concluded, as is the case here, that a declaratory judgment action by a licensee against the licensor was "the type of suit authorized by *Lear* v. *Adkins.*" *Atlas Chemical Industries, Inc.* v. *Moraine Products*, 509 F.2d 1, 5 (6th Cir. 1974).

[7] *Lear, Inc.* v. *Adkins, supra* at 671, 89 S.Ct. at 1911.

435 P.2d at 325. Thus, the facts of *Lear, Inc. v. Adkins, supra,* are identical to the facts here. Both agreements permitted termination, and both licensees failed to comply with the termination provisions. Thus, the Supreme Court's reference to "muzzling" in *Lear* does not depend upon the presence or absence of a license termination clause.

Sybron alternatively argues that it would be inequitable to follow the *Lear* decision here. We read the Supreme Court's opinion in *Lear* as resolving the competing equities between the licensee and the licensor in favor of the licensee. *See* 545-546 *supra.* We, therefore, decline Sybron's invitation to strike a balance which would result in an outcome different from that reached by the Supreme Court in *Lear.*

Nor do we find merit in Sybron's arguments that Amsco waived its patent invalidity and scope contentions in the district court and, therefore, may not pursue them here. Sybron points to the Supreme Court's decision in *Standard Industries, Inc. v. Tigrett Industries, Inc.,* 397 U.S. 586, 90 S.Ct. 1310, 25 L.Ed.2d 590 (1970), in support of this argument. In *Standard Industries,* an equally divided court affirmed the award of royalties in a suit by the patent licensor against the licensee. The licensee had not attempted to attack the validity of the patent, and, under the then prevailing doctrine of licensee estoppel, could not have succeeded in such an attempt. On appeal to the Supreme Court, the licensee sought to attack the validity of the patent based on *Lear, Inc. v. Adkins, supra.*[8] Justice Black, in a dissenting opinion, intimated that four members of the Court considered the licensee's failure to raise an attack on the patent below a waiver of that defense. We

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[8] Lear had been decided on June 16, 1969, after the Court of Appeals decision in *Standard Industries. Tigrett Industries, Inc.* v. *Standard Industries, Inc.,* 411 F.2d 1218 (6th Cir. 1969). The United States Supreme Court decision in *Standard Industries* was rendered on April 20, 1970, which was after *Lear.*

cannot know from this summary affirmance in *Standard Industries* why the Court divided on the applicability of *Lear*. However, in relying on the action of an equally divided court, which has little if any precedential value, Sybron is seeking support from a case with facts clearly distinguishable from those present here.

Like the licensee in *Lear* but unlike the licensee in *Standard Industries,* Amsco raised the issues of the validity and scope of the McDonald patent from the commencement of its action. To this date it has neither withdrawn nor receded from its position. Amsco's amended complaint, its affirmative defenses to motions preclude any finding of waiver.

We, therefore, hold that the district court erred in denying trial of the patent validity and patent scope [9] issues.[10]

IV. DAMAGES ON THE COUNTERCLAIM

Our determination that this case is controlled by *Lear, Inc. v. Adkins, supra,* requires that we vacate so much of the district court's order as awarded royalties to Sybron on its counterclaim. In *Lear* the Court considered whether

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[9] A claim that a patent is overbroad in terms of the prior state of the art, like a claim of patent invalidity, seeks to achieve the "full and free competition in the use of ideas which are in reality a part of the public domain." *Lear, Inc.* v. *Adkins, supra* 395 U.S. at 670, 89 S.Ct. 1902. Long before *Lear,* the Supreme Court had abandoned the rule that the assignor of a patent is estopped to introduce evidence as to the state of the art in order to narrow the scope of a patent when sued by the assignee. *See Westinghouse Electric & Mfg. Co.* v. *Formica Insulation Co.,* 266 U.S. 342, 350-51, 45 S.Ct. 117, 69 L.Ed. 316 (1924). In the context of this case, there is no reason to separate the trial of the scope of the McDonald patent from the issue of its validity.

[10] We do not reach Amsco's due process claims in light of our disposition based on *Lear, Inc.* v. *Adkins, supra.*

the licensee would be liable for unpaid royalties prior to the adjudication of the invalidity of the patent. The Supreme Court reasoned as follows:

> The decisive question is whether overriding federal policies would be significantly frustrated if licensees could be required to continue to pay royalties during the time they are challenging patent validity in the courts.
>
> It seems to us that such a requirement would be inconsistent with the aims of federal patent policy.

Id. 395 U.S. at 673, 89 S.Ct. at 1912. Thus, in *Lear,* where the licensor Adkins brought suit against the license immediately after the patent issued, the Supreme Court held that the licensee could "avoid the payment of all royalties accruing" [11] if it could prove that the patent was invalid. *Id.* at 674, 89 S.Ct. at 1913; *see Painton & Company v. Bourns, Inc.*, 442 F.2d 216, 226 (2d Cir. 1971).

Sybron contends that even if the McDonald patent is found invalid, Amsco nevertheless remains liable for the royalties and interest (as corrected, see note 4 *supra*) awarded by the district court's order of January 24, 1975. Essentially, Sybron asserts that a patent licensee is responsible for the payment of royalties until either the license is terminated or the patent is declared invalid. As authority for this argument Sybron cites the Sixth Circuit's two decisions in *Troxel Manufacturing Co. v. Schwinn Bicycle Co.*, 465 F.2d 1253 (6th Cir. 1972), 489 F.2d 968 (6th Cir. 1973), *cert denied,* 416 U.S. 939, 94 S.Ct. 1942, 40 L.Ed.2d

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[11] We need not decide at this time the extent to which a holding that the McDonald patent is invalid, if such be the case, frees the licensee Amsco from accrued royalties. In any case, royalties cannot be assessed against Amsco until its claims as to the validity and scope of the McDonald patent are resolved.

290 (1974). However, the *Troxel* case, as the Sixth Circuit recognized,

> . . . did not involve an action by a licensee attacking the validity of a patent owned by the licensor. It was *not* the type of suit authorized by *Lear v. Adkins* . . . .

Atlas Chemical Industries, Inc. v. Moraine Products, supra at 5. Rather, *Troxel* concerned the liability of a licensee for royalty payments where the licensee did not contest the validity of the patent. In *Troxel* a third party, a stranger to the license agreemnt, challenged the patent's validity. The Sixth Circuit held in that circumstance the licensee could not avoid royalty payments until such time as the patent was declared invalid. *Troxel Manufacturing Co. v. Schwinn Bicycle Co.*, 489 F.2d at 973. However, where as here the licensee has attacked the patent and has therefore brought "the type of suit authorized by *Lear v. Adkins,*" *Atlas Chemical Industries v. Moraine Products, supra* at 5, the Sixth Circuit held that proof of invalidity would free the licensee from liability for all royalties accruing during the course of litigation. Contrary to Sybron's argument, the Sixth Circuit has reached a result identical to ours in a case presenting identical facts.

While intimating no view as to the merits of the patent issues, we recognize that on remand it may be determined that the McDonald patent is valid and not overbroad. If such be the case, Amsco would be liable to Sybron under Sybron's counterclaim and the district court will again have for consideration the calculation of royalties and interest. At such time a damage issue now presented by Sybron's cross-appeal (from the January 24, 1975 order) will again become relevant. Foreseeing this possibility, we consider it appropriate to consider that issue for the district court's guidance.

Sybron argues here that Amsco's accounting methods have made it impossible for it, Sybron, to prove through

an independent audit the amount of royalties owing on the sale of sterilizers equipped with the Medallion process. The district court accepted Amsco's calculation as to the royalties owned and it is that figure which is reflected in the district court's order of January 24, 1975.

In *Westinghouse Electric & Mfg. Co. v. Wagner Electric & Mfg. Co.*, 225 U.S. 604, 618, 19, 32 S.Ct. 691, 696, 56 L.Ed. 1222 (1912), the Supreme Court held in a patent infringement action that where the profits of the infringer attributable to infringement and noninfringement cannot be separated, "the law places the loss on the wrongdoer." This same result follows where the infringer fails to keep proper records. *Gotham Silk Hosiery Co. v. Artcraft Silk Hosiery Mills, Inc.*, 147 F.2d 309, 214-15 (3d Cir. 1945). The burden of proof in such a case is shifted to the infringer or poor record keeper. *See also Calhoun v. United States*, 453 F.2d 1385, 1390, 197 Ct.Cl. 41 (1972). Logic dictates that the principles [12] held applicable to patent infringement cases should similarly be held to apply to situation involving patent license agreements. It will be for the district court to determine on remand whether and to what extent these

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[12] The Supreme Court in *Westinghouse Electric & Mfg. Co., supra* 225 U.S. at 618-19, 32 S.Ct. at 696 stated:

> Having . . . proved . . . the existence of profits, the plaintiff had carried the burden imposed by law, and established every element necessary to entitle it to a decree, except one. As to that, the act of the defendant had made it not merely difficult but impossible to carry the burden of apportionment. . . . [T]he plaintiff had now presented proof to demonstrate its right to the whole of the fund because of the fact that the defendant had inextricably commingled and confused the parts composing it. . . . It presented a case where the court was called on to determine the liability of a trustee *ex maleficio*, who had confused his own gains with those which belonged to the plaintiff. One party or the other must suffer. The inseparable profit must be given to the patentee or infringer. The loss had to fall on the innocent or the guilty. In such an alternative the law places the loss on the wrongdoer.

principles are appropriate and should be applied in the consideration of the damage issues.

Furthermore, should the district court find Amsco liable on the counterclaim, it should determine what, if any, principal and interest should be assessed and from what point in time.

In as much as we cannot forecast the course of the proceedings on remand, we thus cannot predict whether the several damage issues now presented by Sybron on this appeal will again be raised. Nor can we determine at this time, if these issues do surface again, in what form they will be presented and on what record they will be based. Accordingly, we choose not to discuss or pass upon the other damage issues presented by the cross-appeal leaving their resoluton, if they arise, to the district court on remand.

V. CONCLUSION

Having held that the district court erred in its reading and application of *Lear, Inc. v. Adkins, supra,* we are *obliged* to reverse in its entirety the January 24, 1975 judgment, which among other things, denied Amsco a trial on the validity and scope of the McDonald patent,[13] and which granted damages in the amount of $560,508 to Sy-

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[13] Sybron has argued in its brief and at oral argument that our decision in *Thiokol Chemical Corp.* v. *Burlington Industries, Inc.*, 448 F.2d 1328 (3d Cir. 1971), *cert. denied,* 404 U.S. 1019, 92 S.Ct. 684, 30 L.Ed.2d 668 (1972), bars the district court's consideration of Counts I and II of the amended complaint. In *Thiokol* we held that the district court lacked jurisdiction under 28 U.S.C. § 1338(a) in a declaratory judgment action by a licensee to invalidate a patent. In that case where diversity jurisdiction was not asserted and did not appear to be present, we noted that 28 U.S.C. § 1338(a) was "[t]he only basis of jurisdiction pleaded. . . ." *Id.* at 1330.

Although we express no opinion as to jurisdiction on remand, we recognize that here Amsco not only asserts § 1338(a) juris-

bron on its counterclaim.[14] We will therefore reverse the January 24, 1975 judgment and remand for trial of the validity and scope of the McDonald patent and for such further proceedings as may be required with this opinion.

Each party is to bear its own costs.

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diction but also predicates jurisdiction on the parties' diversity of citizenship, 28 U.S.C. § 1332, an aspect not present in *Thiokol*. See note 3 *supra*.

[14] Nothing which we have discussed in this opinion is intended to preclude the district court from finding the principal amount of royalties in the same amount it originally determined in its order of January 24, 1975, if the record on remand, developed consistent with this opinion, leads to that conclusion.

IN THE UNITED STATES DISTRICT COURT
FOR THE WESTERN DISTRICT OF PENNSYLVANIA

C. A. No. 125-69 ERIE

AMERICAN STERILIZER COMPANY, *Plaintiff*

v.

SYBRON CORPORATION and CASTLE COMPANY,
a division of Sybron Corporation, *Defendants*

OPINION

WILLSON, Senior District Judge

This civil action was spawned by the Supreme Court's decision in *Lear, Inc. v. Adkins,* 395 U.S. 653. That case was decided June 16, 1969. A complaint in this case was filed 6 months and 2 weeks later on December 29, 1969.

In my prior decision reversed by the Court of Appeals in *American Sterilizer Co. v. Sybron Corp.,* 526 F.2d 542, decided November 7, 1975, I held that the longstanding doctrine that a patent licensee could not attack the validity of a patent should apply to the evidence which I had before me. The Court of Appeals said I was wrong, and the case was remanded to me for trial on the validity and scope of the McDonald Patent and for further proceedings. Thereafter extensive discovery followed.

A full evidentiary non-jury trial has been had. Oral arguments have been heard on various issues, and now finally, as both sides have filed briefs and proposed findings and conclusions, to all of which the Court has given careful consideration, it is my hope that this marathon patent case, at least in this Court, has reached its destination. It is a case in which able and experienced counsel have examined the genesis of the sterilization process as it has application, generally speaking, in the operation of modern hospitals.

The background in this litigation is in Judge Garth's opinion in 526 F.2d 542. Judge Garth discussed the applicability of the Lear Doctrine, and this Court acknowledges the application, but nevertheless points out that in the instant case experienced and able patent lawyers, some 19 months after the McDonald Patent issued and after disputes and contentions had arisen, reached an agreement on a license. In that agreement the licensee could terminate the license on 30 days' notice by paying royalties. But rather than terminate, AMSCO brought a declaratory judgment action based on the Lear Doctrine. If it loses this case, it still has the license agreement. In other words, plaintiff in this case has it both ways. Nevertheless, the Court of Appeals' decision is now the law of this case.

Up to this point in this litigation, this Court has never stated its opinion as to the validity of the McDonald Patent No. 3,068,064, issued December 11, 1962. Nor has it expressed a view as to the scope of that patent as the scope relates to AMSCO's Medallion Process or equipment. These issues have been the subject matter of vast quantities of evidence both written and oral. As indicaed in my prior decision filed May 24, 1974, (Unreported), it was stated:

> "In a discussion of the trial issues, as the Trial Judge, it is readily admitted in the first instance that the gas sterilization processes were difficult to comprehend when considering pleadings, motions, briefs, and oral arguments. But, however, the visual inspection at the AMSCO manufacturing establishment at Erie clarified the uncertainties, which were in the Court's mind prior to the plant visit. Trial testimony was taken on two occasions at the AMSCO manufacturing establishment. The older apparatus used by AMSCO at the time it signed the license contract under the McDonald Patent was exhibited and examined and explained by expert testimony. At the same time adjacent to the McDonald machine, plaintiff

had set up its Medallion Cycle sterilizing apparatus. Its operation was examined and expert testimony received in explanation of the differences of the two pieces of equipment. There is no question but what plaintiff's Medallion Cycle is the more sophisticated piece of equipment than the older McDonald equipment. In conceding that the Medallion Cycle is advanced in the art over and above the McDonald Patent claims, is it, nevertheless, a part of the same principle covered by the license contract even though it may be an improvement over the original McDonald Process?"

Having lived with this case for nearly 9 years at this point and having heard the repeated assertions of counsel, and having heard the testimony of experts, and having examined the trial exhibits when offered and thereafter, it is believed that I must now decide which litigant is correct.

The 1964 license embraces the patent features, which McDonald has claimed as his invention. The key paragraph reads:

"The term 'Infringing Method' as hereinafter used shall be defined as a method which sequentially includes the steps of:

(1) Evacuation of the chamber to a selected level;

(2) Introducing water vapor *during and/or after evacuation* to humidify the chamber to a selected level *established during or after evacuation.*

(3) Maintaining substantially said selected humidity level for a *dwell period* to permit proper diffusion of moisture into the article being sterilized."

But as the evidence reveals and is summarized in AMSCO's thirty-sixth proposed finding of fact, the McDonald Patent

contains only method claims covering a gas sterilization process. The original patent application Serial No. 701,065 filed on December 6, 1957, included method claims and apparatus claims. Robert McDonald abandoned the apparatus claims and any apparatus invention that Robert McDonald may have made is in the public domain.

Throughout the testimony of the witnesses and in the documentary evidence, the key to the sterilization process as developed by Castle is the *dwell period.* Both parties agree on this point. For instance, defendant's 16th proposed finding reads as follows:

> "*The McDonald Patent*
>
> 16) The McDonald U.S. Patent No. 3,068,064 pertains to an ethylene oxide (ETO) gas sterilization method, or process or cycle. In the process, the goods to be sterilized are sealed in a chamber which is evacuated to a selected level of vacuum. Water vapor is then introduced into the chamber until a selected relative humidity level is attained. The selected level of relative humidity is substantially maintained for a dwell period sufficient to permit proper diffusion of moisture into the goods. After the dwell period, ethylene oxide gas is introduced into the chamber and maintained in the chamber for a time sufficient to effect sterilization of the goods. In the patent, the method or process describes the operation of a particular apparatus or hardware which is one embodiment of the invention wherein the cycle performed by that described apparatus conducts the method in the above defined sequence of steps. The crux of the invention in the McDonald patent is the dwell period at the selected humidity level during which dwell period the thermodynamic conditions within the sterilizing chamber remain constant so that the load can become properly conditioned prior to exposure to the ethylene oxide. (9/73 TR-252, lines 15-20)."

It must be emphasized that both AMSCO and Castle have been rivals in the manufacture and distribution of sterilization equipment throughout the United States. They are still the two main competitors in this business. Prior to its Medallion Process, AMSCO had been marketing its Cryotherm Sterilizer.

Based on all the evidence in this case, I have concluded that if the McDonald Patent is valid, then the Medallion Process infringes it. It seems to me that I at least squinted in that direction in my prior decision after examining the two machines and hearing evidence at the AMSCO manufacturing plant. And now having heard all the additional trial testimony, my tentative conclusion has been reinforced. But at the same time and now I conclude that the McDonald Patent is invalid. I can see no inventible process or method developed by Mr. McDonald. Sterilization per se is old. The American College Dictionary says to sterilize is:

> "1. to destroy microorganisms in, usually by bringing to a high temperature with steam, dry heat, or boiling liquid."

The evidence in this case shows that the manufacturers have continuously engaged in the development of mechanical processes for sterilization of various articles in a quick and effective manner and by an automatic process. Dr. Perkins, Research Director of AMSCO, wrote an article, which is in evidence, which indicates this development and the needs of the industry. I find it impossible to accept the proposition that there is anything new or inventible in a humidified dwell period.

It seems to this Court that in reality both litigants and their witnesses are stressing a novel and useful structure by which sterilization is accomplished. But apparatus and structure have been ruled out of the invention and ruled out of this case. McDonald is a method patent.

Mr. McDonald, the inventor, testified fully at length at this trial. As the Trial Judge, I saw and heard him, and I have again read his testimony. It covers 110 pages of the record. At the time Mr. McDonald was hired on October 31, 1955, AMSCO was marketing a sterilizer using ethylene gas. Castle, now Sybron, was losing out in the competition; and to remain competitive with AMSCO, it desired to develop an ethylene gas sterilizing unit. Prior to his employment, Mr. McDonald had no experience in sterilization. He was a mechanical engineer by training. His previous work involved the designing of operating tables and other mechanical devices. His testimony is revealing as to how he informed himself on the art of gas sterilization. He said [Tr. 499-500]:

> "THE COURT: When did you brush up on the sterilization features of this thing? You said that you came to this concept during the summer of 1956. You were only there less than a year when you came up with this idea, is that right?
>
> "THE WITNESS: Well, I was handed a bibliography of information to date on gas sterilization. I went to the University of Rochester's library and spent about four weeks reading and taking notes and trying to educate myself on the ethylene oxide state of the art of sterilization. In which case, there were several articles from Saul Kaye and Phillips and the art of sterilizing many things; tobacco, food products with ethylene oxide. So, by the time two months had gone by, I had my mind—a pretty good approach to where Castle might go to improve the art, or expand our products into something that was in the printed literature, or at least some knowledge——
>
> "THE COURT: Well, was Castle, at that time, using ethylene oxide in their sterilization?
>
> "THE WITNESS: No, they were not.

"THE COURT: They hadn't commenced that at all?

"THE WITNESS: No, a carboxide sterilizer was known to the trade. American Sterilizer was selling them and filling orders with this carboxide process of low temperature sterilization, not using steam, and in order for Castle to keep up with the art of sterilization, they felt they had to get into it themselves. So, they had to hire somebody, and I was the person that they hired to do it.

"THE COURT: But, you knew about ethylene oxide. When did you learn about that?

"THE WITNESS: The day that I showed up at Castle Company."

In this case it takes careful study to distinguish between the method which was patented and the structure or apparatus which was not. A fair reading of Mr. McDonald's testimony indicates that during the summer of 1956, he was searching for an appartus as well as for a method. Neither litigant sold a method as such. It sold sterilizers which embrace each firm's method of sterilizing hospital goods. I have concluded that the McDonald method does not embrace subject matter patentability under § 101. This is a conclusion not pressed by AMSCO, perhaps for the reason that AMSCO's Medallion equipment is an ethylene gas sterilizer.

Recent decisions of the Supreme Court, notably *Gottschalk v. Benson,* 409 U.S. 63, (1972), and *Parker v. Flook,* —— U.S. ——, (June 22, 1978), an opinion by Mr. Justice Stevens, and the discussions in those opinions, as well as the references to other earlier decisions, have satisfied me that there is no invention in the dwell period method when the apparatus is discarded. The sentence in the *Gottschalk* case, page 70:

"Transformation and reduction of an article 'to a different state or thing' is the clue to the patentability

> of a process claim that does not include particular machines."

is the key to my thinking on this point.

It comes to mind that the sterilization of a hospital bandage is not transforming or reducing that bandage to a different state or thing. It is still a bandage. Freezing vegetables, meats and shrimp does not transform those articles "into a different state or thing."

In the old case, *Corning, et al. v. Burden,* 56 U.S. 252, 267, it is said:

> "A new process is usually the result of a discovery; a machine, of invention. The arts of tanning, dyeing, making water-proof cloth, vulcanizing India rubber, smelting ores, and numerous others, are usually carried on by processes, as distinguished from machines. One may discover a new and useful improvement in the process of tanning, dyeing, &c., irrespective of any particular form of machinery or mechanical device. And another may invent a labor-saving machine by which this operation or process may be performed, and each may be entitled to his patent."

The Court continues at page 268:

> "But the term process is often used in a more vague sense, in which it cannot be the subject of a patent. Thus we say that a board is undergoing the process of being planed, grain of being ground, iron of being hammered, or rolled. Here the term is used subjectively or passively as applied to the material operated on, and not to the method or mode of producing that operation, which is by mechanical means, or the use of a machine, as distinguished from a process."

My conclusion is that there is no magic in the phrase: *dwell period.* The word *dwell,* standing alone, means to continue for a time, to linger, or delay, tarry or abide.

In the course of decision making on extended litigation, there comes a time in a non-jury case when the Trial Judge must make a decision as to which of the litigants is to prevail. During the course of this litigation, I have kept an open mind on all the issues, as certainly the methods presently used in the sterilizers sold by each of the parties are an advance over prior methods. Low sterilization temperatures are needed to fumigate, but not damage the many plastic materials now used in hospitals. The advent and use of ethylene gas as the sterilizing agent fulfilled the need of the industry as it fumigates at low temperature. But neither litigant claims any invention in the use of ethylene gas. Nor, of course, could there be any claim of invention in the prior use of steam, Formaldehyde, or even boiling water as sterilizing agents. Nor can there be an invention in the moisturizing of the goods.

Upon due consideration of all the evidence, the statute, and the decisions, I have concluded that plaintiff is to have the decision on all the validity issues in this case. I find the McDonald Patent invalid on 3 grounds:

(1) Lack of patentible subject matter;

(2) Anticipated in the prior art;

(3) Invalid under § 102(b).

What has been said relates primarily to my second stated reason for invalidity. This decision is based upon the testimony of witnesses heard at the trial, my examination of the exhibits, and my review of the trial record as a whole. I have concluded that plaintiff's Findings of Fact Numbers 43 through 61 inclusive, express in detail the reasons and findings which I make on this phase of the

case. These proposed findings submitted by counsel for plaintiff are, therefore, adopted and embraced in this decision as findings of fact. They follow:

43. In addition to the prior art considered by the Patent Office during prosecution of the McDonald Patent, the prior art includes:

> British Patent No. 3137 issued to Defries in 1903 for Improvements in Disinfectors and Processes for Disinfection (British Defries Patent)
>
> British Patent No. 488,638 issued to Wiles and Merriam in 1938 for Improvements in or relating to the Treatment of Materials, for example Fumigation thereof (British Wiles-Merriam Patent)
>
> *Anticeptics, Disinfectants, Fungicides, and Chemical and Physical Sterilization,* Published by Lea and Febiger, Philadelphia 1954, Chapter 30, entitled "Gaseous Sterilization" by C. R. Phillips PhD. (pages 638-654) (Phillips Publication)
>
> *Principles and Methods of Sterilization* by John J. Perkins, M.S. and published by Charles C. Thomas in May 1956, Chapter XXI "Gaseous Sterilization with Ethylene Oxide," pp. 325-334 (Perkins Publication)

44. The British Defries Patent discloses a gaseous sterilization process in which steam is flowed into and through the sterilizing chamber under the influence of vacuum to simultaneously heat and humidify the goods to be sterilized. The steam is flowed continuously into and through the sterilizing chamber when under the influence of vacuum until the goods are heated to a desired temperature. When the goods are heated to the desired temperature, sterilizing gas is then introduced into the chamber. The British Defries Patent discloses formaldehyde as a sterilizing gas and teaches that in sterilization processes using sterilizing gases such as formaldehyde the goods to be

sterilized must possess sufficient moisture so as not to compromise the microorganism killing ability of the sterilizing gas.

45. The British Wiles Merriam Patent relates to gas sterilization and refers to ethylene oxide as the preferred gas. This patent discusses the flow-through conditioning method of the British Defries Patent without limiting that process to formaldehyde. Also, this patent discloses apparatus for gas sterilization including means for heating the walls of the sterilization chamber by use of heating coils or other heating means.

46. The Phillips Publication discusses the knowledge in the art of gas sterilization at the year 1954. Phillips states that in gas sterilization the goods are required to be properly moisturized; that formaldehyde and ethylene oxide are both gases having microorganism killing properties; that formaldehyde and ethylene oxide were the two most used gases in gaseous sterilization processes; that ethylene oxide more recently became known to possess microorganism killing properties as compared to formadlehyde, and that ethylene oxide possesses advantages over formaldehyde. In particular, Phillips states that the use of ethylene oxide is less expensive than the use of formaldehyde; that ethylene oxide makes it possible to sterilize goods at a lower temperature; that all traces of ethylene oxide may be easily removed from the sterilized goods while formaldehyde leaves lingering, unpleasant odors, and that ethylene oxide has the capability of penetrating plastic and other materials to permit sterilization of packaged goods, while formaldehyde does not.

47. The Perkins Publication teaches that sterilization with ethylene oxide requires the goods to be moisturized prior to sterilization such as being in equilibrium with relative humidities of 30 to 60 percent. Perkins discloses an automatic gas sterilizer utilizing ethylene oxide. Elec-

tric heating strips are provided to heat the walls of the sterilizing chamber. There is no provision for introducing water vapor into the sterilizing chamber.

The British Defries Patent Is the Most Pertinent Prior Patent

48. The British Defries Patent is more pertinent than the U.S. Merriam Patent; it is the most pertinent prior art. The British Defries Patent discloses a process in which steam is flowed into and through the sterilizing chamber for a period of time to moisturize and heat the goods before the sterilizing gas is introduced into the chamber. That process is the "humidity dwell' concept; that process is practiced in the Medallion Sterilizer.

49. The United States patent to Merriam et al No. 2,080,179 (U.S. Merriam Patent), considered by the U.S. Patent Office, discloses no dwell between humidifying the sterilizing chamber to a selected level and introduction of sterilizing gas. That fact is recognized by the parties in the License Agreement which states that "Non-Infringing Methods," revealed in part by the U.S. Merriam Patent

> "—will be without any dwell period of the moisture after establishing a selected humidity level and will be immediately followed by the introduction of the sterilizing gas into the chamber."

The Difference Between the Claims of the McDonald Patent and the Prior Art

50. There is no essential difference between the prior art, British Defries Patent in particular, and the process called for by claims 1 and 2 of the McDonald Patent when such claims are broadly construed to embrace the process of the Medallion Sterilizer.

51. The process steps required by claims 1 and 2 of the McDonald Patent broadly construed to embrace the proc-

ess of the Medallion Sterilizer and the process steps disclosed in the British Defries Patent are identical: the sterilizing chamber is evacuated; steam is flowed into and through the sterilizing chamber while the chamber is being evacuated to humidify the chamber to a selected level; steam is continued to be flowed into and through the chamber while being evacuated to heat and moisturize the goods to be sterilized and, when the goods are heated to a desired temperature, a sterilizing gas is introduced into the chamber.

52. Claims 1 and 2 of the McDonald Patent, when broadly construed to embrace the Medallion sterilizer, require the sterilizing gas to be ethylene oxide whereas the British Defries Patent discloses formaldehyde as an example of a sterilizing gas. The "humidity dwell" concept by definition requires completion of the process steps involved before the sterilizing gas is introduced into the sterilizing chamber. The particular sterilizing gas used is unrelated to the "humidity dwell" concept. The "humidity dwell" concept does not change if ethylene oxide or formaldehyde is used; any difference in result flows from the particular sterilizing gas used.

The Claims of the McDonald Patent Are Invalid Under 35 U.S.C. 103

53. The claims of the McDonald Patent when broadly construed to embrace the Medallion Sterilizer differ from the process of the British Defries Patent only in that the claims require the use of ethylene oxide whereas the British Defries Patent mentions formaldehyde as an example of a sterilizing gas.

54. Formaldehyde and ethylene oxide are both sterilizing gases. Ethylene oxide became known as a sterilizing gas decades after the British Defries Patent issued, and it has been known since at least 1954 that ethylene oxide possesses many advantages over formaldehyde.

55. Sybron's expert witness Robert Ernst testified at trial that problems would arise if ethylene oxide were substituted for formaldehyde in the process of the British Defries Patent. In particular, Robert Ernst testified that in operation of the process of the British Defries Patent the sterilizing chamber would be humidified to 100% relative humidity which would result in "wetting" of the goods and prevent the ethylene oxide from performing its micro-organism killing action.

56. Robert Ernst in his statement embodied in Sybron's Pretrial Narative Statement said that since formaldehyde and ethylene oxide are not chemically similar,

> —it would not be obvious to one skilled in the art to substitute ethylene oxyde in place of formaldehyde in the process described by the British Patent No. 3137. Their reactions under similar conditions might be quite different.

In that statement, Robert Ernst did not mention the purported "wetting" problem. The purported "wetting" problem which arose for the first time when Robert Ernst testified at trial, is an afterthought.

57. The purported "wetting" problem does not preclude or raise any serious problem in using ethylene oxide in the process of the British Defries Patent. The "wetting" problem would not arise until it was decided to use ethylene oxide in the process of the British Defries Patent. At trial Robert Ernst testified under cross examination that the "wetting" problem has been known since the time ethylene oxide was found to be a sterilizing gas. Robert Ernst also testified that the relative humidity in the sterilizing chamber of the British Defries Patent could be decreased to a value less than 100% relative humidity and overcome the "wetting" problem, by following well-known principles of thermodynamics, such as by heating

the walls of the sterilizing chamber, a feature known in the prior art.

58. The Perkins Publication discloses a "Carboxiclave" which is a gas sterilizer using ethylene oxide as the sterilizing gas. The "Carboxiclave" does not include an arrangement for introducing water vapor into the sterilization chamber; however, Perkins recognizes the need to moisturize the goods before the sterilizing gas is fed to the chamber. The British Defries Patent teaches that the process disclosed may be operated at the highest temperature that can be sustained by the items to be sterilized. Perkins said an earlier described bulk sterilizer was poorly adapted to the sterilization of heat-sensitive articles. Thus, there is a suggestion of using the process of the British Defries Patent in the gas sterilizer of Perkins to satisfy the recognized moisture requirements.

59. When the preconditioning process of the British Defries Patent is added to the gas sterilizers of Perkins, the resulting sterilizer would embody the subject matter of claims 1 and 2 of the McDonald Patent when broadly construed to cover the process of the Medallion Sterilizer.

60. Sybron contends it would be non-obvious to Perkins since his sterilizer included no apparatus for introducing water vapor into the sterilizing chamber. But the question is: would it be obvious or non-obvious for Perkins to use the teachings of the British Patent? That question cannot be answered since the record includes no evidence of Perkins having knowledge of the British Defries Patent at the time of his publication.

61. The purported "wetting" problem would not present any problem in the use of the preconditioning process of the British Defries Patent in the sterilizer of Perkins since the Perkins sterilizer uses ethylene oxide and has means for heating the walls of the sterilizing . . .

Invalidity Under Section 102(b)

(Commercialization of The McDonald Method More Than One Year Prior to December 6, 1957).

Amsco contends that the McDonald patent is invalid under 35 U.S.C.A. § 102(b) for being "on sale" more than one year prior to the filing date of the patent. Section 102(b) reads:

> "A person shall be entitled to a patent unless—
>
> (b) the invention was . . . on sale in this country, more than one year prior to the date of the application for patent in the United States, . . ."

The critical date on this issue is December 6, 1956.

In February 1956, Robert McDonald devised the plan for gas sterilization using ethylene oxide which embodied the humidity dwell concept. After various experimentations, it was in August 1956 that the plan was successfully reduced to practice. Working with a Castle 2238 steam sterilizer which has been converted for gas operation at Strong Memorial Hospital in Rochester, New York, with the assistance of Daryl Shea, then a medical student who did the bacterial work, Robert McDonald came upon the idea of using a bottle containing a measured amount of water, of vaporizing the water from the bottle and of introducing such vaporized water into the sterilization chamber. Under this procedure, there was a 100% kill of a wide variety of microorganisms of the type identified in the McDonald patent. McDonald described the result obtained when using the water bottle as a "spectacular breakthrough." The sterilizer used in these tests was manually operated.

At least by August 20, 1956, the Wilmot Castle Company had built and successfully operated at least 2 additional sterilizers embodying the humidity dwell concept. A document entitled "Test Series No. 023," dated August 20, 1956, summarized results of tests on an 1826 sterilizer and

on a 2436-48 sterilizer, as well as on the 2238 sterilizer. This report indicates a 100% kill of microorganisms was obtained on each of these sterilizers.

After the successful operation of the sterilizer at Strong Memorial Hospital, Robert McDonald worked on the mechanical way of accomplishing the sequence. As mentioned earlier, he had been hired specially to develop a method of gas sterilization. At that time, the Castle Company was producing only steam sterilizers, and to meet the competition, it needed to develop a gas sterilizer. All the initial development of a gas sterilizer at the Castle Company proceeded under the direction and guidance of McDonald.

The Castle Company exhibited an automatic gas sterilizer at the American Hospital Association Convention in Chicago, Illinois, on September 19-21, 1956. Photographs of that exhibit appear in the Otcober 1956 and November 1956 issues of the publication "HOSPITAL TOPICS." PX 21 and 20. The sterilizer was identified as the new "Castle Automatic Gas Sterilizer." This sterilizer included a water bottle attached to the front of the sterilizer cabinet and had a control panel including 5 pilot lights.

The defendant attempts to negate the significance of the exhibition of the sterilizer at the convention because it claims that the sterilizer was merely a mock-up and not an operational model. This Court does find that the sterilizer exhibited at the convention was non-operational, but that finding does not alter the import of defendant's activity. The purpose of the exhibit was to promote the product and to generate sales. The only gas sterilizer the Castle Company had to sell or promote was the ethylene gas sterilizer embodied in the McDonald invention. Although defendant claims that the purpose of this display was merely to obtain customer reaction, it was nevertheless an attempt to lure customers and to sell its newly developed gas sterilization product.

Prior to October 2, 1956, personnel of the Castle Company met with personnel from Becton, Dickinson and Company and discussed the purchase of gas sterilization equipment. On October 4, 1956, defendant received from Becton, Dickinson and Company a formal purchase order, dated October 2, 1956, for the following equipment at stated prices: two (2) rectangular sterilizers size 48" x 54" x 84" with thermatic control for steam operation and two (2) consoles for automatic gas sterilization—$31,738.00 and one (1) 1826L sterilizer for gas sterilization only—$2,660.00. This purchase order was accepted by the Castle Company on October 25, 1956. The equipment was delivered on the following dates:

48 x 54 x 84 sterilizers	—2/27 28/57
consoles	—2/20/57
1826 cylindrical sterilizer	—5/21/57

Both the consoles and 1826 sterilizer were built to operate according to a sterilization cycle embodying the "humidity dwell" concept found in the McDonald patent.

The evidence also indicates that by at least November 11, 1956, a contract had been entered into with Charles River Breeding Laboratories for a console embodying the "humidity dwell" concept of the McDonald patent. On March 28, 1957, defendant delivered a control console, identified by the word "Steroxide," which indicates that this console delivered to Charles River Breeding Laboratories embodied the "humidity dwell" concept of the McDonald patent.

Defendant claims that these orders were merely research orders and that these customers had contracted only for the development of gas sterilization equipment to meet their needs. However, the equipment as finally shipped to these customers did come within the claims of the McDonald patent. This Court finds that when the Castle Company did offer to sell and did indeed agree to sell this equipment,

that it was selling equipment coming within the framework of the newly developed McDonald process. At that time, its customers might not have known exactly how the McDonald process was to work, but they were buying equipment designed to operate under the McDonald method more than 1 year prior to the application for the McDonald patent being filed at the U. S. Patent Office.

As mentioned heretofore, McDonald's patent application, filed December 7, 1957, embodies both the method and the structure. In interrogating Mr. McDonald, Castle's patent and trial counsel, Mr. Schovee, of course, understood the issues. For instance, Mr. Schovee's qustion to Mr. McDonald reads. [Tr. 402, Ln. 11-16]:

> "Q. When I refer to your process, your method, or the method of your invention, or similar phrases hereafter, you understand that I am referring to your patented process as claimed in United States Patent No. 3068064, Plaintiff's Exhibit No. 2. As of December 7, 1956, how far had your work progressed to develop a sterilizer to carry out your method?"

It is to be recalled that during the year prior to December 6, 1957, Mr. McDonald was working on his method and also his structure as his application included both. In interrogation(Mr. McDonald kept referring to the sterilizing unit. At the trial, the construction of the unit was out of the picture. Mr. Schovee, of course, realized this and was careful to keep Mr. McDonald on the track, that is, on his method. This occurs again in Mr. Schovee's direct examination of Mr. Glen, now a vice-president, but in 1956, a sales correspondent of Castle. He reached a like understanding with the witness. The question reads [Tr. 510, Ln. 7-10]:

> "Q. When I refer to Robert L. McDonald's invention, or his patented invention, or similar phrases, you'll understand that I'm referring to his invention

as covered by the claims of U. S. Patent No. 3068064, Plaintiff's Exhibit No. 2?"

Again Mr. Schovee is careful to confine his witness's replies to the method rather than the unit. In Mr. Glen's testimony, Mr. Schovee does accomplish this fact by a series of leading questions. For instance, a series of questions commencing at Tr. 510, Ln. 21-25, illustrate the point. One reads:

"Q. Prior to December 7, 1956, did you know of any ethylene oxide sterilizer, or sterilizer control console released for manufacture, which was capable of carrying out the method subsequently patented in Plaintiff's Exhibit No. 2?

"A. No."

Further testimony of the witness, Glen, illustrates the difficulty in which Castle found itself in the fall of 1956 with respect to the commercialization of the McDonald method. Interrogation of Mr. Glen reads in part [Tr. 513, Ln. 15 through Tr. 514, Ln. 12]:

"Q. Were any discussions held with the Becton-Dickinson personnel prior to October 25, 1956, or equipment demonstrated, which would have disclosed to the Becton-Dickinson personnel that the equipment that they would receive would be capable of a sterilizing method including the steps of the McDonald process later to be patented in Plaintiff's Exhibit No. 2?

"A. No.

"Q. Aside from Becton-Dickinson knowing the equipment would operate with ethylene oxide gas, to your knowledge, did any personnel at Becton-Dickinson know, prior to October 25, 1956, the details of the method or process which would be ultimately supplied with the equipment?

"A. To my knowledge, no one did.

"Q. Do Plaintiff's Exhibits 29 through 33 indicate the ethylene oxide process to be used with that equipment, or how they would operate?

"A. No, there is no definition as to the process, or how the process owuld operate.

"Q. At the time these orders were entered, did the Castle Company have either an 1826 steroxide laboratory autoclave, or a steroxide control console in its product line?

"A. No."

Mr. Glen's testimony is both contradictory and revealing. On cross examination, the contradiction appears [Tr. 529, Ln. 21 through Tr. 530, Ln. 10]:

"Q. But the fact is, that the order was accepted by you—the Becton-Dickinson order was accepted by you, notwithstanding the fact that the subject matter of the order was not in the company's product line at the time, isn't that true?

"A. First of all, it wasn't accepted by me. It was entered by me. It was accepted by someone else in the Sales Department and at least two of the products with which I was most concerned, were the price book, which were the two live sterilizers.

"Q. And the other three items were not in the price list?

"A. No, they were not.

"Q. But yet, they were sold. That's my point.

"A. Yes, orders were taken for them."

And finally, [Tr. 531, Ln. 21 through Tr. 532, and 533, Ln. 3]:

"Q. You testified with respect to the Becton-Dickinson order a few moments ago, Mr. Glen, that the or-

der itself, Plaintiff's Exhibit No. 23, did not describe a process, is that true? Is my understanding of your testimony correct?

"A. I don't think I testified to that, Mr. O'Neil.

"Q. I'll ask you, then. With respect to the 1826 sterilizer, which is described in the Becton-Dickinson purchase order, Plaintiff's Exhibit No. 23, does the purchase order describe anything about the operation of the 1826 sterilizer?

"A. Do you want me to read it to you?

"Q. Read it to yourself, then answer my question.

"A. Well, it describes a sterilizer equipped with parts and piping for automatic gas operation.

"Q. Yes, do you know what automatic gas operation means, as that language appears?

"A. No, I do not.

"Q. You have no idea?

"A. I have no idea.

"Q. Do you know what the term 'gas sterilization' means in the first paragraph of the Becton-Dickinson purchase order, Plaintiff's Exhibit No. 23?

"A. I don't see to which part you are referring.

"Q. The first paragraph that refers to the 48 x 54 x 84. There is a paragraph that says "gas sterilization."

"A. It says, 'for automatic gas sterilization.'

"Q. Yes, what does that mean as it is used there?

"A. It means sterilization by ethylene oxide gas, to me.

"Q. So that 'sterilization with gas' means ethylene oxide gas?

"A. In my opinion, it does."

Mr. McDonald has testified with respect to his work at the Strong Memorial Hospital and thereafter:

> "I did not invent, or discover, or envision any improvement over that method." [Tr. 463, Ln. 8-9].

No doubt defendant is correct in its assertion that no sterilizer was built or in the product line embodying the McDonald concept prior to December 6, 1956. But in this Court's mind the evidence is simply overwhelming that the McDonald method was promoted and sold by the defendant over one year prior to the patent application. Plaintiff's Exhibits 21, 23 and 88 simply cannot be disregarded. In Plaintiff's Exhibit 88, Mr. Glen is saying on October 15, 1956:

> "We have received the formal purchase order for the gas sterilizing equipment which was previously discussed with the above company."

This exhibit refers to the purchase order, Exhibit 23. What has been discussed had to be as mentioned in Plaintiff's Exhibit 21:

> "M. G. McBane, Wilmot Castle, explains features of new automatic gas sterilizer to . . . ."

As Mr. Justice Stewart has recently said in the *Parker* case:

> "Section 101 is concerned only with subject matter patentability. Whether a patent will actually *issue* depends upon the criteria of §§ 102 and 103, which include "novelty and inventiveness, among many others. It may well be that under the criteria of §§ 102 and 103 no patent should issue on the process claimed in this case, because of anticipation, abandonment, obviousness, or for some other reason.

In this case, I have determined that there is no subject matter patentability, and now determine that under—

> § 102. *Conditions for patentability; novelty and loss of right to patent*

the right to a patent has been lost by Mr. McDonald and defendant, as the method described in the patent was on sale in this country more than 1 year prior to the date of the application. On the issue under § 102(b), the decisions of the courts in this circuit are controlling. I have reviewed the authorities cited by counsel for each of these parties on the issue arising under 35 U.S.C. § 102(b). It is my view that counsel for plaintiff has carefully and correctly cited the authoritative decisions, and plaintiff's brief on this phase of the case covers the points at issue. It is unnecessary at this point to discuss independently those decisions. The brief of counsel for plaintiff on this phase of the case is accepted and adopted. It sets forth the decisional law to be applied to my findings under § 102(b). It reads:

The McDonald Patent Is Invalid Under 35 U.S.C. § 102(b)

Section 102(b) provides that a patent is invalid when the invention was "in public use or on sale" in this country more than a year prior to the date of application for the patent. The question involved in this litigation is whether activity by Sybron more than one year prior to the filing of the application namely December 6, 1956, the critical date, placed the invention "on sale" under the statute. The activities of Sybron include competitive use, offers of sale, and contracts of sale of the asserted invention.

Competitive Use Invalidates a Patent Under § 102(b)

The Third Circuit Court of Appeals in *U. S. Chemical Corporation et al v. Plastic Glass Corporation,* 243 F.2d 892 (1957) adopted Judge Learned Hand's competitive use

doctrine set forth in *Metallizing Engineering Co. v. Kenyon Bearing and A. P. Co.* 153 F.2d 516 Second Cir. (1956). In *U. S. Chemical* Judge Biggs stated (p. 849):

> The issue is what is a public use or sale within the purview of the statute. This question was cogently discussed by Judge Learned Hand in the *Metallizing Engineering Co.* case, supra. We can add little of value to what Judge Hand said in the cited decision. We are in accord with what he stated.

In *Metallizing* Judge Hand discussed the competitive use doctrine as follows (153 F.2d 520):

> It is indeed true that an inventor may continue for more than a year to practice his invention for his private purposes or his own enjoyment and later patent it. But that is, properly considered, not an exception to the doctrine [competitive use], for he is not then making use of his secret to gain a competitive advantage over others; he does not thereby extend the period of his monopoly.

In *Metallizing* and in *U.S. Chemical* the "competitive use" was the selling of products produced by a secret process later patented and both Courts found a "public use" bar. However, as Chief Judge Wright held in *Philco Corporation v. Admiral Corporation,* 199 F.Supp. 797, D.C. Del. (1961) there is no persuasive reason why the competitive use doctrine does not apply to the "on sale" portion of Section 102(b).

In *Philco* representative of Firestone, a regular customer of Philco, visited Philco prior to the critical date and was shown "mock-ups" of the Seventeener III (a portable television set) which represented the design but would not perform electronically. The Firestone representatives were told that no sets would be produced or available until June

1958 and that final prices had not been established. Prior to the critical date, Philco gave Firestone an estimated price range and Firestone indicated the quantities to be delivered when the sets became available. Chief Judge Wright in holding that the foregoing facts established an "on sale" bar under Section 102(b) stated:

> Judge Learned Hand held [in *Metallizing*] that an inventor cannot be allowed to use his device competitively more than one year prior to his patent application no matter how little the public learns of the invention. It was reasoned that such a competitive use prior to a patent application is the effective equivalent of an extension of the patent monopoly. This Rule has been adopted in the Third Circuit. *United States Chemical Corp. v. Plastic Glass Corp.*, 243 F.2d 892 (3 Cir. 1957). (p. 816)
>
> There is no persuasive reason why the policy delineated so cogently in *Metallizing Engineering Co.*, supra, does not apply to the "on sale" portion of Section 102(b) and invalidates the '134 and '577 patents. The March showing to Firestone was clearly a competitive use of the Seventeener III and the patents embodied therein. It was a sales effort, Philco's purpose being to sell Firestone representatives on the new line and to persuade them to buy it. (p. 816)
>
> The words "on sale" themselves imply that the intent of the inventor is the critical factor. It is a question of fact to be determined upon all the evidence and in light of all the circumstances of the case. The words "on sale" themselves are not so complex as to compel overly-defined distinctions which ignore the infinite variety of commercial practices. In this case it is clear Philco was trying to sell its new line to Firestone. This was a competitive use. As such, a failure to invalidate the '134 and '577 patents, assuming they

> are otherwise valid, would lead to an unwarranted extension of the patent monopoly. (pp 817-18)*

Other District Courts within the Third Circuit have relied upon the "competitive use" doctrine in finding an "on sale" bar under Section 102(b).

> *J. L. Clark Mfg. Co. v. American Can Co.*, 256 F. Supp. 719, 734 (D. N.J., 1966)
>
> *Kraftco Corp. v. Beatrice Foods Co.*, 342 F.Supp. 1361, 1383 (D. N.J., 1971)
>
> *Orton v. Robicon Corp.*, 378 F.Supp. 930, 938-939 (W.D. Pa., 1974), aff'd mem., 515 F.2d 507 (3rd Cir. 1975)

An Offer of Sale Invalidates a Patent Under § 102(b

In *Chromalloy American Corp. v. Alloy Surfaces Co., Inc.*, 339 F.Supp. 859, D.C. Del. (1972), Judge Latchum held that an offer of sale of a later patented invention, before the critical date, satisfied the "on sale" part of Section 102(b) and invalidated the patent. In *Chromalloy*, a "U" process had been reduced to practice and thereafter, prior to the critical date, the patent owner gave Pratt & Whitney a tentative schedule of prices depending upon the number of blades produced by practicing the "U" process. Judge Latchum stated (p 869):

> When an invention is offered for sale more than a year before the patent application is filed, it is "on sale" within the meaning of 35 U.S.C. § 102(b), even if an actual sale has not occurred. This is true, even when (a) but one offer has been made to but one customer; (b) the prices are only estimated rather than

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* The '134 patent is a design patent and the '577 patent is an apparatus patent covering internal construction of the television set.

established; (c) no commercial production runs have been made; and (d) the alleged invention is never sold. Minnesota Mining & Mfg. Co. v. Kent Industries, Inc., 274 F.Supp. 993 (E.D. Mich. 1967), aff'd 409 F.2d 99 (C.A. 6, 1969); Philco Corp. v. Admiral Corp., 199 F.Supp. 797, 814 (D. Del. 1961); Chicopee Mfg. Corp. v. Columbus Fiber Mills Co., 165 F.Supp. 307 (M.D. Ga. 1958); Wende v. Horine, 225 F. 501 (C.A. 7, 1915). The facts are inescapable that plaintiff for more than a year prior to filing the parent patent application actively attempted to sell its U process coatings for superalloy metals and therefore the patent is invalid under 35 U.S.C. § 102(b).

The holding in *Chromalloy* has been relied upon or cited in other Courts. In *Kalvar Corp. v. Xidex Corp.*, 556 F.2d 966, 968 (1977) the Ninth Circuit Court of Appeals found that the distribution of samples embodying the patented invention was an offer of sale establishing an "on sale" bar within the meaning of Section 102(b). The Circuit Court cited *Chromalloy* in its decision. In *Spalding Division of Questor Corp. v. Antonious et al* 68 F.R.D. 222, 227 (D. Md. 1975), the Court quoted from *Chromalloy* the rule that an offer of sale before the critical date invalidates the patent even when but one offer has been made but to one customer; the prices are only estimated rather than established; no commercial productions have been made, and the alleged invention is never sold.

In *Interlego, A.G. v. F.A.O. Schwarz, Inc.*, 187 U.S.P.Q. 580 (N.D. Ga. 1975) the Court cited *Chromalloy* in support of the rule that an actual sale is not required in order to establish a bar under the "on sale" portion of Section 102(b).

Teledynev U.S. 192 U.S.P.Q. 55 (Ct. Clms. 1976) and *Jack Winter, Inc. v. Koratron Co., Inc.*, 375 F.Supp. 1 (N.D. Cal. 1974) are examples of cases in which the rule of *Chromalloy* was distinguished on the facts.

In *Dempster Brothers v. Borg-Warner Corp.*, 170 F. Supp. 488, 494 (E.D. Tenn. 1958) the Court found that the exhibition of a later patented apparatus at a convention placed the apparatus "on sale" under Section 102(b).

A Contract to Sell Prior to the Critical Date Constitutes "On Sale" Under § 102(b) When Delivery Is After the Critical Date

At least at one time there were differences among Circuits whether "on sale" under Section 102(b) requires or does not require delivery of the thing sold prior to the critical date. The Second Circuit Court of Appeals in *Timely Products Corporation v. Arron et al,* 523 F.2d 288 (2nd Cir. 1975), analyzed the conflicting decisions*. The Circuit Court in *Timely* then held (page 302):

> We accordingly conclude that Section 102(b) bars an application for patent filed more than one year after the solicitation of an order for a specific article to be produced later, where the following requisites are present:
>
> (1) The complete invention claimed must have been embodied in or obvious in view of the thing offered for sale.
>
> ———
>
> (2) The invention must have been tested sufficiently to verify that it is operable and commercially marketable.
>
> ———
>
> (3) Finally, the sale must be primarily for profit rather than for experimental purposes.

Whether an "on sale" bar arises under Section 102(b) as a consequence of a competitive use, an offer of sale or

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* In *Timely*, the Court cited a paper published in the Stanford Law Review entitled "New Guidelines for Applying the On Sale Bar to Patentability", 24 Stan. L. Rev. 730 (1972), copy attached.

a contract to sell, there is no requirement that there be a disclosure of the invention involved; it is necessary only that the activity embody the later patented invention. *United States Chemical Corporation,* supra; *Metallizing Engineering Co.,* supra.

The citation of authorities in defendant's brief, as submitted by Mr. Schovee, and the argument contained therein, has not been overlooked. But in my view, his citations generally referred to structure or units not being completed or in the research stage during the one year period. Defendant's arguments on this phase of the case must simply be rejected.

Throughout this case Mr. Schovee, counsel for defendant, has stressed the principle that the McDonald patent is clothed with the presumption of validity because of having been issued by the Patent Office. This principle has not been disregarded by me as the Trial Judge, but the overwhelming preponderance of the evidence requires the findings and conclusions, which I have reached, that McDonald Patent No. 3,068,064 is invalid. The reasons have been fully set forth in this decision.

It is to be observed at this point that plaintiff, AMSCO, is a Pennsylvania corporation having its principal place of business at Erie, Pennsylvania.

Defendants are Sybron Corporation and Castle Company, a Division of Sybron Corporation. Sybron is a corporation of the State of New York and has its principal place of business in Rochester, New York. During the years 1955, 1956, and 1957, the Castle Company was an independent corporation known as Wilmot Castle Company. Sybron Corporation does business in this judicial district.

Finally, the counterclaim on which Sybron received a large award in my prior decision is still pending in this case. In the license agreement, the subject matter covered

by royalty payments was the McDonald patent. The Leuthner U.S. Patent No. 3,013,573 and its Canadian counterpart patent are royalty free. This Court accepts Judge Garth's discussion and decision in his prior opinion with respect to liability of the licensee, AMSCO, for unpaid royalties in the 1964 agreement. Under *Lear v. Adkins,* and as discussed by Judge Garth, AMSCO attacked the patent by the filing of this lawsuit on December 29, 1969. I, therefore, find and conclude that Sybron may prevail only on its counterclaim as to any unpaid royalties which accrued prior to the filing of this lawsuit. Sybron's Leuthner patents, that is, U.S. Patent No. 3,013,573, and Canadian Patent No. 670,196, were royalty free in the license agreement of 1964. With the invalidity of the McDonald patent being determined as of the commencement of litigation on December 29, 1969, all the royalty payments terminate from that time forward. This Court has examined the record, but has not been able to determine whether there were unpaid royalties due under the license agreement on the date of the suit. In the judgment, provision will be made for the assessment of any monies due on the counterclaim to the date of the suit. Otherwise judgment will be entered for the plaintiff on defendants' counterclaim.

In conclusion, many of the findings and conclusions are embraced within this opinion as permitted under Rule 52. Separate findings and conclusions have been adopted, but only after independent examination and review and careful study. Some of these were submitted by counsel for plaintiff, but they are believed correct and required under the evidence.

Detailed conclusions of law follow:

CONCLUSIONS OF LAW

1. The Court has jurisdiction of the parties under 28 U.S.C. § 1332 and § 1338. Venue is proper.

2. The presumption of validity under 35 U.S.C. § 282 may be weakened or overcome when relevant prior art has not been considered by the Patent Office. *Phillips Electronic & Pharmaceutical Industries Corp. v. Thermal & Electronics Industries, Inc.*, 450 F.2d 1164 (CCA 3 1971). The degree by which the presumption is weakened depends upon balancing of the pertinence of the newly-cited art against the pertinence of the art actually considered by the Patent Office. *Aluminum Co. of America v. Amerola Products Corp.*, 552 F.2d 1020 (CCA 3 1977). The British Defries Patent, not considered by the Patent Office, discloses a gas sterilizing process in which moisture is introduced into the sterilizing chamber and maintained in the chamber for a period of time ("dwell period") to permit proper diffusion of moisture onto the goods before the sterilizing gas is introduced into the chamber. On the other hand, the prior art considered by the Patent Office discloses no such "dwell period." The "dwell period" is the crux of the asserted invention; the presumption of validity of the McDonald Patent has been overcome or destroyed.

3. McDonald U.S. Patent No. 3,068,064 is invalid under § 101 for lack of patentible subject matter.

4. The United States Patent Laws 35 U.S.C. § 102(b) provides that a patent is invalid when the invention was "on sale" in this country more than one year prior to the date of the application for patent, the "critical date." The critical date of the McDonald Patent is December 6, 1956.

5. Competitive use of a later patented invention before the critical date invalidates the patent under the "on sale" provision of § 102(b). The doctrine of "competitive use" finds its origin in *Metallizing Engineering Co. v. Kenyon Bearing and A P. Co.*, 153 F.2d 516, Second Cir. (1946). The Third Circuit Court of Appeals adopted the doctrine of "competitive use" in *U.S. Chemical Corpora-*

tion et al. v. Plastic Glass Corporation, 243 F.2d 892, (CCA 3 (1957). In *Metallizing* and in *U.S. Chemical,* the "competitive use" was the selling, prior to the critical date, of products produced by a secret process later patented and both courts found a "public use" bar. However, as Chief Judge Wright held in *Philco Corporation v. Admiral Corporation,* 199 F. Supp. 797, D.C. Del. (1961), there is no persuasive reason why the "competitive use" doctrine does not apply to the "on sale" provision of § 102(b). Other District Courts within the Third Circuit have relied upon the "competitive use" doctrine in finding an "on sale" bar under § 102(b). *J. L. Clark Mfg. Co. v. American Can Co.,* 256 F.Supp. 719 (1966); *Kraftco Corp. v. Beatrice Foods Co.,* 342 F.Supp. 1361 (1971) and *Orton v. Robicon Corp.,* 378 F. Supp. 930, W.D. Pa. (1974).

6. The Wilmot Castle Company's exhibit of its "New Automatic Gas Sterilizer" at the American Hospital Association Convention in September 19-21, 1956, was a "competitive use" of Robert McDonald's asserted invention which invalidates the McDonald Patent under the "on sale" provision of § 102(b). The sterilizer exhibited embodied or was intended to embody the "moisture dwell" concept which is the crux of the asserted invention of Robert McDonald. The new automatic gas sterilizer was exhibited for commercial purposes; to obtain customers and promote sales. It is of no moment that the exhibited sterilizer may not have disclosed the asserted invention to the public; the "competitive use" doctrine exists even if the asserted invention be maintained in secret. *Metallizing Engineering Co.; Philco Corporation.* Furthermore, it makes no difference if the exhibited sterilizer was operable, was operated, was not operable, or was not a complete sterilizer. *Philco Corporation v. Admiral Corporation,* supra.

7. The exhibit of the Wilmot Castle Company's new automatic gas sterilizer at the American Hospital Association Convention in September 19-21, 1956, invalidates the McDonald Patent under § 102(b) for the additional reason

that the exhibit placed on sale and was an offer to sell a sterilizer embodying the "moisture dwell" concept. *Chromalloy American Corp. v. Alloy Surfaces Co., Inc.*, 339 F. Supp. 859, D.C. Del. (1972); *Kalvar Corp. v. Xidex Corp.*, 556 F.2d 966, (CCA 9 (1977); *Spalding Division of Questor Corp. v. Antonious et al.*, 68 F.R.D. 222 (D.C. Md. 1975). An actual sale is not required. *Interlego, A.G. v. F.A.O. Schwarz, Inc.*, 187 USPQ 580 (N.D. Ga. 1975). The exhibition of a later patented apparatus at a convention has been found to place the apparatus "on sale" under § 102(b). *Dempster Brothers v. Borg-Warner Corp.*, 170 F. Supp. 488 (E.D. Ten.).

8. Prior to the critical date of December 6, 1956, the Wilmot Castle Company agreed to manufacture and deliver gas sterilizing equipment embodying the "humidity dwell" concept to Becton, Dickinson and Company, and to Charles River Breeding Laboratories, Inc. With respect to each purchaser, the equipment was delivered after December 6, 1956. Prior to the agreements, the Wilmot Castle Company had built and successfully tested gas sterilizing apparatus embodying the "humidity dwell" concept and the "new" sterilizer was exhibited at the American Hospital Association Convention. The equipments to be delivered embodied the "humidity dwell" concept since that process was the only sterilizing process worked on by the Wilmot Castle Company at the time and the apparatuses delivered were not "shelf" items but were manufactured to order.

9. The activities of the Wilmot Castle Company in relation to each of its customers, Becton, Dickinson and Company, and Charles River Breeding Laboratories constituted a "sale" which invalidate the McDonald Patent under § 102(b). The sale to the Becton, Dickinson and Company standing alone is sufficient to invalidate the McDonald Patent.

10. The United States Supreme Court in *Graham v. Deere*, 383 U. S. I set forth the guidelines for making de-

terminations under § 103, to wit: to determine the scope and content of the prior art; to ascertain the differences between the prior art and the claims in issue; to resolve the level of ordinary skill in the art; and against that background to determine the obviousness or non-obviousness of the subject matter involved. The scope of the claims are determined by consideration of the patent itself, the file history of the patent and the prior art. *Graham* v. *Deere.* A person of ordinary skill in the art has knowledge of the prior art. *Dann v. Johnston,* 425 U.S. 219 (1976).

11. There is no essential difference between the subject matter disclosed by the British Defries Patent and the subject matter defined by claims 1 and 2 of the McDonald Patent when broadly construed to cover the continuous flow process of the Medallion Sterilizer. The only difference is the type of sterilizing gas used after the "humidity dwell" is completed; the claims require ethylene oxide while the British Defries Patent identifies formaldehyde as a sterilizing gas that may be used.

12. It would be obvious to a person of ordinary skill in the art of sterilization to use ethylene oxide as the sterilizing gas in the process of the British Defries Patent. Formaldehyde and ethylene oxide are both sterilizing gases; ethylene gas was found to be a sterilizing gas decades after use of formaldehyde. Ethylene oxide is a more favorable sterilizing gas. *AMP Inc. v. Burndy Corporation,* 332 F.2d 236 (CCA 3 1964). Also, the British Wiles-Merriam Patent discusses the process of the British Defries Patent in the environment of ethylene oxide.

13. With respect to Sybron's counterclaim for royalties, the decisions, *Lear v. Adkins,* 395 U.S. 653, and the Court of Appeals in this case at 526 F.2d 542, permit the licensor to collect unpaid royalties which accrued prior to the licensee challenging patent validity even if the license patent is held invalid. Plaintiff as licensee challenged this McDonald patent by filing of this lawsuit on December 29,

1969. Defendant is entitled to any unpaid royalties under said license agreement to that date.

A judgment order will be entered.

ORDER FOR JUDGMENT

AND NOW, *November 2, 1978,* for the reasons mentioned in the foregoing opinion, which embraces the findings of fact and conclusions of law, the judgment of this Court is:

(1) That the McDonald Patent No. 3,068,064 must be and is declared invalid;

(2) Judgment shall be entered on the whole record in favor of the plaintiff, American Sterilizer Company, and against the defendant, Sybron Corporation and Castle Company, a Division of Sybron Corporation; and

(3) On the counterclaim, judgment is directed to be entered against the defendant, Sybron Corporation, and in favor of the plaintiff; but with the provision, however, that if Sybron claims an accrual of unpaid royalties under the license agreement to December 29, 1969, it may file a motion under Rule 59 to amend the judgment on the counterclaim to that extent.

IT IS SO ORDERED.

/s/ JOSEPH P. WILLSON
Joseph P. Willson
Senior District Judge

UNITED STATES COURT OF APPEALS
FOR THE THIRD CIRCUIT

Nos. 79-1445 and 79-1446

AMERICAN STERILIZER COMPANY,
Appellant in No. 79-1445

v.

SYBRON CORPORATION and CASTLE COMPANY,
A Division of Sybron Corporation,
Appellants in No. 79-1446

APPEAL FROM THE UNITED STATES DISTRICT COURT
FOR THE WESTERN DISTRICT OF PENNSYLVANIA

(D.C. Civil No. 69-0125)

Argued October 10, 1979

Before: ADAMS, ROSENN, and WEIS, *Circuit Judges*

(Opinion Filed February 4, 1980)

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OPINION OF THE COURT

ROSENN, *Circuit Judge.*

In the century that has elapsed since Joseph Lister revolutionized the medical field by his advocacy of antiseptic surgical procedures, the medical profession has come to rely upon the use of sterilized instruments and materials as an indispensable ingredient of proper health care. In this patent appeal, we are asked to assess the validity of a sterilization process known as the "McDonald patent" issued to Castle Company (Castle), a division of Sybron Corporation (Sybron), and whether American Sterilizer Company (Amsco), a competitor, owed any royalties to Sybron under a licensing agreement for sales of an alleged infringing sterilizer.

The present controversy originated over a decade ago when Amsco filed a declaratory judgment action in the United States District Court for the Western District of Pennsylvania seeking to determine the validity and scope of the McDonald patent as well as a declaration as

to whether its own "Medallion sterilizer" came within the definition of "Infringing Method" in the licensing agreement. The district court held that the McDonald patent was invalid, but relying on the decision of the United States Supreme Court in *Lear, Inc. v. Adkins*, 395 U.S. 653, 89 S.Ct. 1902, 23 L.Ed. 2d 610 (1969), it found that Amsco was liable for damages for breach of the licensing agreement up to the time it instituted this action. The court fixed damages in the amount of $112,206, plus interest. Amsco appeals from the district court's award of royalties to Sybron and Sybron cross-appeals from the court's invalidation of the McDonald patent. We affirm.

I.

This controversy, like most patent cases, wends its way through a complex network of facts. Sterilization in the context of this case may be roughly defined as a method of killing harmful or unwanted microorganisms through the use of a gas having biocidal properties. Originally, formaldehyde was used as a sterilizing agent, but after a number of years, ethylene oxide was discovered to possess far superior sterilization properties. In 1956, Robert McDonald was engaged by the Castle Company to develop an ethylene oxide sterilizer. McDonald developed a sterilizer which operates in the following manner:

> (1) The goods to be sterilized are placed in a sealed chamber.
>
> (2) A vacuum pump evacuates the air in the chamber to a selected level at which time the pump is turned off.
>
> (3) A measured quantity of water is introduced into the evacuated chamber to humidify the goods to a selected level while the pump is off.

(4) The selected humidity level is maintained for a "dwell period"[1] in order to moisten the goods.

(5) After the goods are moistened, ethylene oxide is introduced as the sterilizing agent.

Each of the steps in the method is a discrete segment of the process and the McDonald process is known as a "step-by-step" process.

McDonald filed a patent application for his process and sterilizer on December 6, 1957, which was granted by the United States Patent Office on December 11, 1962.[2] Sybron Corporation, as Castle's parent, became the owner of the McDonald patent.

When the McDonald patent was first issued, Amsco was selling a Cryotherm sterilizer operating in principle similar to the McDonald patent. In order to avoid an infringement lawsuit, Amsco and Sybron entered into a licensing agreement on July 22, 1964, by which Amsco agreed to and did pay royalties to Sybron on the Cryotherm sterilizers. Amsco, however, subsequently developed another ethylene oxide sterilizer which it called the Medallion sterilizer. The Medallion sterilizer operates in the following manner:

(1) The chamber is evacuated to a specified level by a vacuum pump which continues to operate.

(2) While the pump is operating, steam is introduced into the chamber to heat and moisten the goods.

(3) At a selected temperature the pump is terminated and the ethylene oxide is introduced.

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1. A "dwell period" may be defined as an ideal period of time for the diffusion of moisture in the evacuated chamber at a preselected humidity level into the article to be sterilized.

2. United States Patent No. 3,068,064 and Canadian Patent No. 664,895. McDonald abandoned any patent claim to the apparatus and consequently the patent covers only the sterilization process itself.

Because the vacuum pump operates continuously, the Medallion sterilizer embodies what may be termed a "continuous flow process."

The Medallion sterilizer is the subject of the present proceedings. The companies could not agree on whether this sterilizer came within the definition of "Infringing Method" under the licensing agreement of July 22, 1964, covering the McDonald patent.[3] Amsco brought a declaratory judgment action on December 29, 1969, to determine the validity of the McDonald patent and its liabilities, if any, under the licensing agreement. An amended action was filed on May 25, 1970, in which Amsco principally charged that (1) the McDonald patent was invalid; (2) the Medallion sterilizer was not covered by the claims of the McDonald patent when such claims were interpreted in light of prior art, and (3) the Medallion sterilizer was not within the definition of infringing method in the licensing agreement. The parties by stipulation agreed only to try the last issue of the scope of the infringing method definition.

Following the stipulation, Sybron answered only Count III of Amsco's complaint dealing with the definition of infringing method. Sybron counterclaimed against Amsco under this count for all royalties owed for sales of the alleged infringing Medallion sterilizers. Amsco replied to the counterclaim by interposing as affirmative defenses its original contentions that the McDonald patent was invalid (Count I), and that the Medallion sterilizer did not come within its claims when

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3. The licensing agreement defined "Infringing Method" as:

> [A] method which sequentially includes the steps of:
>
> (1) Evacuation of the chamber to a selected level;
>
> (2) Introducing water vapor *during and/or after evacuation* to humidify the chamber to a selected level *established during or after evacuation*.
>
> (3) Maintaining substantially said selected humidity level for a *dwell period* to permit diffusion of moisture into the article being sterilized. (Original emphasis.)

narrowed by prior art (Count II). The district court in a bench trial found for Sybron on its counterclaim and assessed $560,508 representing royalties plus interest due on the sale of Medallion sterilizers. The court denied, on the ground that a licensee is estopped from challenging a patent's validity during the duration of the license, subsequent motions by Amsco raising the patent's validity and scope as defenses.

We reversed in an opinion written for this court by Judge Garth, *American Sterilizer Co. v. Sybron Corporation*, 526 F.2d 542 (3d Cir. 1975), holding that under the United States Supreme Court's decision in *Lear, Inc. v. Adkins, supra*, the doctrine of licensee estoppel no longer prevented the licensee from challenging the patent's validity during the life of the licensing agreement. The case was remanded to the district court for a determination of the validity and scope of the McDonald patent.

The district court, after a second bench trial, declared the McDonald patent invalid under: (1) 35 U.S.C. §101 (1976) for lack of patentable subject matter; (2) 35 U.S.C. §102(b) (1976) as being "on sale" more than one year prior to the filing date of the patent; and (3) 35 U.S.C. §103 (1976) as obvious in light of prior art. The district court also held that Amsco had breached its licensing agreement with Sybron by marketing the Medallion sterilizer and in accordance with principles announced in *Lear, supra*, assessed $112,206 plus interest in royalties against Amsco for sales up to the initiation of the lawsuit.

We believe the district court was correct in invalidating the patent as obvious in light of prior art under 35 U.S.C. §103, and under *Lear*, we conclude Amsco owed royalties to Sybron on sales of Medallion sterilizers. For purposes of clarity we will first examine the patent validity issue raised by Sybron's cross-appeal and then we will determine whether Amsco had any royalty obligation to Sybron.

II.

The district court held the McDonald patent to be invalid under 35 U.S.C.§103 which provides:

> A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Section 103 is designed to exclude from patentability discoveries that do not meet a certain minimal level of inventiveness. The Supreme Court has stated: "Unless more ingenuity and skill . . . were required . . . than were possessed by an ordinary mechanic acquainted with the business, there was an absence of that degree of skill and ingenuity which constitute essential elements of every invention. In other words, the improvement is the work of the skilled mechanic, not that of the inventor." *Hotchkiss v. Greenwood*, 52 U.S. (11 How.) 248, 267, 13 L.Ed. 683, 691 (1851).

Because inventiveness is such an elusive concept, courts have attempted to set up criteria by which a particular claimed invention may be measured to see if the patent is obvious or nonobvious. Obviousness under section 103 is determined through three related inquiries: (1) scope and content of prior art; (2) differences between prior art and the claimed invention; (3) the level of ordinary skill in the art. *Graham v. John Deere Co.*, 383 U.S. 1, 17, 86 S.Ct. 684, 693, 15 L.Ed.2d 595 (1966); *Sims v. Mack Truck Corp.* 608 F.2d 87, 90 (3d Cir. 1979); *Paeco, Inc. v. Applied Moldings, Inc.*, 562 F.2d 870, 877 (3d Cir. 1977). The Supreme Court has

indicated that "[s]uch secondary considerations as commercial success, long felt but unsolved needs, failure of others, etc., might be utilized to give light to the circumstances surrounding the origin of the subject matter sought to be patented." *Graham, supra,* 383 U.S. at 17-18. We have held, however, that these secondary factors "cannot by themselves support a finding of nonobviousness if it is otherwise established that a patent's disclosures are obvious in light of the prior art." *Tokyo Shibaura Electric Co. v. Zenith Radio Corp.*, 548 F.2d 88, 94-95 (3d Cir. 1977); *Sims, supra,* 608 F.2d at 90. Thus, to assess the validity of the McDonald patent under 35 U.S.C. §103, we must examine: (1) existing sterilization processes and principles at the time of McDonald's invention; (2) the claimed differences between the McDonald process and prior sterilization art; (3) the level of ordinary skill in the art of inventing sterilizing processes.

A. *Scope and Content of Prior Art*

The earliest known patented gas sterilization process was developed in Britain around the turn of the twentieth century and utilized formaldehyde as the sterilization agent. This process, known as the "British Defries Patent" (Defries), operated by continuously passing steam through a chamber, and moistening the goods to be sterilized to a 100% humidity level to enable the formaldehyde to kill effectively any unwanted microorganisms. Formaldehyde, however, proved to be less than an ideal sterilization agent particularly because it did not penetrate completely certain kinds of material and left a distasteful odor on the sterilized article. Further, to operate efficiently formaldehyde required a high moisture content in the article to be sterilized.

Some years later, ethylene oxide was discovered to be another effective sterilization agent. In the late 1930's, two patents, one British and one American were

awarded for sterilization processes using ethylene oxide. The British Wiles-Merriam patent discussed the Defries continuous flow process but without limiting it to the use of formaldehyde as the sterilization agent. This patent also disclosed a method for heating the walls of the sterilization chamber to pass steam through it. The British Wiles-Merriam patent corresponds to a similar American process, the U.S. Merriam and Wiles patent.

By 1954, it was known that ethylene oxide was a far superior sterilization agent to formaldehyde. The use of ethylene oxide is less expensive than formaldehyde; goods may be sterilized at a lower temperature; all traces of ethylene oxide may be easily removed from the sterilized article, and ethylene oxide has the capability of penetrating materials resistant to formaldehyde. These findings were summarized in a publication by C.R. Phillips. "Gaseous Sterilization," *reprinted in* Reddish, *Antiseptics, Disinfectants, Fungicides, and Chemical & Physical Sterilization*, 638-654 (1954).

Further, it was known that ethylene oxide operated effectively at lower levels of moisture content in the article to be sterilized. A publication by John J. Perkins, *Principles and Methods of Sterilization*, Chapter XXI, at 325-334 (1956) taught that ethylene oxide requires the goods to be moistened prior to sterilization, ideally with the moisture content to be in equilibrium with 30-60% relative humidity. One of the chief problems encountered with the use of ethylene oxide was excess "wetting" of the goods. Although it was known that ethylene oxide was only maximally effective at lower levels of moisture content, existing ethylene oxide sterilizers were unable to prevent excess moisture from remaining in the goods to be sterilized. Perkins developed an ethylene oxide sterilizer but it did not provide for the measured introduction of water vapor into the sterilization chamber.

B. *Differences Between McDonald and Prior Art*

In 1956, Castle Company hired Robert McDonald to develop an ethylene oxide sterilizer. McDonald was not trained in this particular field and consequently undertook to familiarize himself with the existing art. He subsequently found a solution to the problem of maintaining the proper relative humidity for the maximization of ethylene oxide's biocidal properties. McDonald's process, in essence, embodied a "dwell period" at a preselected humidity level in which moisture could diffuse into the article to assure the optimum efficiency for ethylene oxide. The selected humidity level was achieved by attaching a bottle containing a measured quantity of water to the sterilizer. The water would then vaporize when heat was applied and moisten the article inside the chamber to the proper relative humidity. The sequential operation of the vacuum pump in McDonald's sterilizer maintained the selected humidity level for a specific period of time, thereby allowing the moisture to diffuse into the article to be sterilized at a designated relative humidity before the ethylene oxide was introduced into the sterilization chamber.

The claimed difference between McDonald's process and prior art is precisely the "dwell period" at a selected humidity level. No prior process had been able to regulate with such precision the moisture content within the sterilization chamber. The key question then is whether McDonald's contribution to the ethylene oxide gas sterilizer industry was the product of true "inventiveness" or whether it was simply the work of a skilled mechanic operating with existing technology.

C. *Ordinary Level of Skill*

The third and crucial inquiry under section 103 is whether given the prior art, a person of ordinary skill in the art would have discovered the claimed invention. If

the leap between the prior art and the asserted differences in the claimed discovery is not the product of true "inventiveness", the patent must be declared invalid for obviousness.

From our review of the existing art, we note initially that the problem of excess moisture in ethylene oxide sterilizers was well-known at the time of McDonald's invention. Indeed, Sybron's expert admitted that this problem was obvious from existing literature but asserted that its solution was not discernible. McDonald's answer to the excess moisture problem was to attach a bottle containing a measured amount of water which would vaporize when heated by a coil, thereby humidifying the goods inside the sterilizing chamber to a selected humidity level. The humidity level was in turn maintained for a "dwell period" to permit proper diffusion throughout the item to be sterilized. This essentially is the invention before us.

McDonald abandoned any patentable claim to the sterilizing apparatus itself. Therefore, the unique feature of his device, the attached water bottle, is in the public domain. If anything is patentable, it is the *idea* of introducing a measured quantity of water vapor into the sterilization chamber, which then is permitted to diffuse into the article during a "dwell period." The district court's findings reveal that at the time McDonald invented his process it was known: (1) from the Defries patent that articles to be sterilized should be humidified inside a chamber; (2) from Perkins, that ethylene oxide operated effectively at only 30-60% relative humidity; and (3) from thermodynamic principles that the relative humidity level in the chamber may be decreased to less than 100% humidity by heating the walls of the chamber. We believe from this existing knowledge, it would have been obvious to a person of ordinary skill in the art that the way to solve the excess humidity problem with ethylene oxide was to introduce a measured volume of water va-

por by evaporating a selected quantity of water through the application of heat. Further, the maintenance of the humidity level for a "dwell period" to permit proper diffusion was a logical corollary of the known requirement of using less than 100% humidity.[4] With formaldehyde, however, the articles to be sterilized became immediately saturated with water vapor once steam was introduced into the chamber.

Although McDonald found a solution to the excess moisture (wetting) problem, which had eluded others and which proved to be a great commerical success, these secondary considerations can not obscure the obviousness of McDonald's discovery in light of prior art. Our conclusion is underscored by the manner in which McDonald made his discovery. McDonald had no prior training in the development of ethylene oxide sterilizers. After he was hired by Castle Company, McDonald read and familiarized himself with the existing art. He then proceeded to experiment with techniques for introducing lower levels of water vapor into the sterilization chamber with the resultant discovery of the water bottle system. We believe this process reveals that McDonald's discovery could have been made by anyone with ordinary skill in the subject art simply through variations in the mechanical combination of the existing art. We therefore see no error in the district court's invalidation of the McDonald patent as obvious under section 103.[5]

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4. The district court found as a fact that the Defries patent disclosed a process in which steam was brought into and through the sterilizing chamber for a period of time to moisturize and heat the goods to be sterilized before the introduction of the sterilizing gas into the chamber.

5. Our holding makes it unnecessary to examine the alternative grounds of invalidity found by the district court under 33 U.S.C. §§101, 102(b).

III.

The district court, although declaring the McDonald patent invalid, nevertheless awarded Sybron $112,206 on its counterclaim against Amsco for royalties under the licensing agreement allegedly due on sales of Medallion sterilizers up until the filing of the present action. The district court held that the Supreme Court's decision in *Lear*, *supra*, permitted such a royalty award even though the patent was declared invalid.

The parties expend considerable energy contesting whether under *Lear*, Amsco had any royalty obligation on the Medallion sterilizers because it allegedly fell within the scope of the McDonald patent's claims. This dispute, however blends two analytically distinct issues. Amsco conceivably owed Sybron royalties because the Medallion sterilizer was (1) within the scope of the McDonald patent's claims, or (2) within the definition of "Infringing Method" under the licensing agreement. The former theory is one of patent infringement; the latter poses simply a breach of contract claim.

The confusion between the parties is generated in part by a misunderstanding of the district court's opinion. At a post-trial hearing, Judge Willson clarified his position by stating that the royalty award was not based on a determination that the Medallion sterilizer was within the scope of the McDonald patent, but rather on his determination that the Medallion was within the definition of "Infringing Method" under the licensing agreement.[6]

Hence, despite the patent's invalidity, Sybron had a contract claim against Amsco enforceable until the initiation of the lawsuit. Amsco has not argued that the Medallion sterilizer was not within the definition of "In-

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6. This result is consistent with the court's holding in the first trial of this case that the Medallion was within the scope of the infringing method definition in the license.

fringing Method" in the licensing agreement. We, therefore, must accept the district court's determination that the Medallion sterilizer was within the scope of the licensing agreement.[7]

We must determine, however, the extent of Amsco's royalty obligation under the license. In the first appeal in this case, we indicated that under *Lear*, Amsco's royalty obligations would have been suspended upon filing of the lawsuit if the patent were declared invalid. Amsco claims it owed no royalties up until the filing of the lawsuit because none were ever paid on the Medallion sales and the McDonald patent has now been declared invalid. Writing for the court in the earlier appeal, Judge Garth declined to decide "the extent to which a holding that the McDonald patent is invalid . . . frees the licensee Amsco from accrued royalties." 526 F.2d at 548 n.11. That is precisely the task before us now.

In *Lear*, the Supreme Court formally repudiated the doctrine of licensee estoppel which prevented licensees from challenging the validity of a patent during the life of the licensing agreement. 395 U.S. at 670-71. Under *Lear*, a licensee may indeed challenge the validity of the patent which it has licensed and its royalty obligation is suspended "at least from the time he refuses to pay the contractual royalties." *Id.* at 674. This freedom from a royalty obligation springs from patent law policy. That policy encourages licensees to litigate the validity of patents, because patents are issued ex parte by the Patent

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7. Amsco contends that the district court was required to decide the scope of the McDonald patent's claims, but failed to do so. Amsco, citing the United States Supreme Court's decision in Westinghouse Electric & Mfg. Co. v. Formica Insulation Co., 266 U.S. 342 (1924), argues that the scope of the patent must be narrowed in light of prior art. The district court, however, held that the patent was invalid and decided the issue of royalties on the basis of the licensing agreement rather than the scope of the patent. We agree and therefore do not decide the issue of the scope of the patent.

Office.[8] Thus, the effective method for assaying the validity of the patent is for a licensee to challenge it, claiming that he owes no royalties because the patent is invalid. One commentator has observed: "The 'spirit of *Lear*' appears to be one of providing some incentive to licensees to challenge patent validity and to eliminate obstacles to suit by those disposed to challenge the validity of a patent." McCarthy, *"Unmuzzling" the Patent Licensee: Chaos in the Wake of Lear v. Adkins (Part I)* 59 J. Patent Office Society, 475, 476 (1977).

The *Lear* decision, although it discarded the undesirable contractual principle of licensee estoppel, has engendered considerable confusion regarding other contractual issues relating to licensing agreements. The problem has been succinctly stated: "How much of the law of contracts and patents must fall in order to give licensees sufficient encouragement to challenge [the validity of patents]." *Id.*

The classic case which *Lear* envisions is one in which the licensee pays royalties for a period of time under a licensing agreement, then ceases payment and promptly brings a lawsuit challenging the patent's validity.[9] Problems, however, arose with interpreting what actually constituted a prompt challenge by the licensee to the patent's validity. Although the Supreme Court in

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8. For example, the U.S. Patent Office did not consider the British Defries patent in prosecuting the McDonald patent application and issued the patent only in light of the U.S. Merriam-Wiles patent. Amsco was able to introduce the Defries patent as relevant prior art by challenging the McDonald patent's validity.

9. *Lear* itself involved a different set of facts. In *Lear*, the parties entered into a licensing agreement *before* the patent was issued. Upon issuance, the licensee sued to declare the patent invalid. Thus, the royalty question in *Lear* was whether under California state law, a contractual obligation existed prior to the patent's issuance. The Court remanded the case for a determination of this issue. 395 U.S. at 675.

Lear had stated that a licensee's royalty obligation was suspended when royalty payments were halted, the Sixth Circuit in *PPG Industries, Inc. v. Westwood Chemical, Inc.*, 530 F.2d 700, 706 (6th Cir.), *cert denied*, 429 U.S. 824 (1976), has read *Lear* to permit other cut-off dates for the licensee's royalty obligations under the licensing agreement.

In *PPG Industries*, *supra*, the court indicated that "[s]omething more than non-payment" of royalties is necessary to insure that the licensee promptly challenges the patent's validity. In *PPG*, the licensee, PPG Industries, suspended royalty payments in 1969 under a non-exclusive license with Westwood Chemical, Inc. PPG, however, did not inform Westwood of the reason for its non-payment of royalties. At the time, infringement suits brought by Westwood against various companies were pending, in which the validity of Westwood's patents was also challenged. PPG actively assisted Westwood in bringing these infringement suits. A district court in 1970 found the patents invalid. In 1971, PPG brought a declaratory judgment action against Westwood for breach of the license, and when the district court's invalidation of the patents was affirmed on appeal, amended its complaint to assert the patents' invalidity. PPG thereby sought to collaterally estop Westwood from claiming any royalties under the license from the date PPG suspended royalty payments. Relying on the presence in *Lear* of the "additional affirmative step of notifying the licensor of invalidity," *id.* at 706, the Sixth Circuit held that the date PPG filed its lawsuit in 1971 was the cut-off date under *Lear* for royalty obligations under the licensing agreement. *Id.* at 707.

The result in *PPG Industries* has been praised as consistent with *Lear's* goal of promoting prompt challenges to the patent's validity:

> If a licensee has a non-frivolous basis for asserting the patent's invalidity and so informs the licensor,

> and if the licensee stops paying royalties, then the licensee may be freed from royalty payments unless the licensor sues the licensee for royalties and the patent's validity is sustained. However, the declaratory judgment action brought by PPG to assert that the licensor had breached the license agreement offered no opportunity to contest the validity of the patent.

Jennings and Bryan, *The Ever Expansive Scope of Lear v. Adkins: Does It Have Limits?* 59 J. Patent Office Society, 679, 698 (1977). Thus, the key issue is whether a prompt challenge to the patent follows the licensee's suspension of royalty payments.

Amsco argues that its non-payment of royalties for sales of the Medallion sterilizer operated as the requisite suspension of royalties so as to invoke *Lear's* protection. It is not clear from the record when Amsco first began marketing the Medallion, but there is nothing in this record to indicate that Amsco coupled its non-payment of royalties *with notice to Sybron* that the reason for non-payment was Amsco's intent to challenge the validity of the McDonald patent. Rather, the parties apparently entered into negotiations concerning whether the Medallion was within the scope of the definition of infringing method in the licensing agreement. There is no indication that at these negotiations, Amsco informed Sybron that the McDonald patent's validity was in issue. The first clear indication of Amsco's intent to challenge the McDonald patent came with the filing of the present lawsuit in 1969. Thus, to relieve Amsco from royalty obligations prior to the initiation of the lawsuit would not further *Lear's* policy of encouraging licensees to promptly challenge a patent's validity. We, therefore, believe the district court was correct in selecting the date the lawsuit was filed as the date from which Amsco's

royalty obligation under the licensing agreement ceased.[10]

IV.

The only remaining issue is the district court's computation of the royalties owed by Amsco. In the first appeal, Sybron argued that Amsco's accounting methods made it impossible for it to determine the amount of royalties owed on Medallion sales. Judge Garth noted that in patent infringement actions, the loss due to an inability to compute damages accurately is placed on the infringer where it has failed to keep adequate records. 526 F.2d at 548-49. Judge Garth indicated that a similar result should obtain in breach of licensing agreement cases and that the district court on remand should consider the problem of Amsco's recordkeeping in determining royalties owed.

Judge Willson awarded Sybron $112,206 plus interest in royalties. The parties stipulated, to avoid an accounting trial, that this sum would be an accurate figure of Medallion sales. Sybron, at a post-trial hearing, however, pressed for a royalty figure of $143,000 on the

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10. Sybron argues that the actual cut-off date should be much later, possibly as late as 1974, because the parties stipulated to try first only the issue of the scope of the infringing method definition in the licensing agreement. Sybron, however, had notice of Amsco's intent to challenge the validity of the McDonald patent in 1969, and we believe should not be permitted to take advantage of a stipulation which it agreed to in the interest of simplifying the litigation between the parties.

Sybron also contends that Amsco's royalty obligation for Medallion sales did not end on the date the lawsuit was filed because only the McDonald patent was challenged and the license agreement was a package license containing other patents, which although royalty free, were not challenged. This argument was not raised in the district court and we accordingly decline to consider it for the first time on appeal. *See* Kappel v. United States, 437 F.2d 1222, 1224 (3d Cir.), *cert. denied*, 404 U.S. 830 (1971).

ground that Amsco did not keep adequate records of infringing and non-infringing methods. The court rejected this argument and entered judgment on the stipulated figure. Sybron argues on appeal that the district court did not adequately consider the problem of Amsco's recordkeeping as this court commanded in the first appeal.

We do not believe the district court erred in entering judgment in the amount stipulated to by the parties. The $112,206 figure represents the sales on Medallion sterilizers and Sybron's acceptance of this figure as accurate makes any consideration of additional damages due to Amsco's allegedly inadequate recordkeeping speculative. We believe the $112,206 figure represents a just damage award to Sybron for breach of the licensing agreement. We accordingly affirm the district court's entry of judgment on Sybron's counterclaim in the amount of $112,206.

V.

In sum, we hold that the McDonald patent is invalid for obviousness under 35 U.S.C. §103 and the judgment of the district court in No. 79-1446 will be affirmed. We also hold that Sybron was entitled to $112,206 in damages for breach of the licensing agreement by Amsco up until the filing of this lawsuit in 1969 and accordingly the judgment of the district court in No. 79-1445 will be affirmed.

Costs to be taxed against Amsco in No. 79-1445 and against Sybron in No. 79-1446.

A True Copy:

Teste:

Clerk of the United States Court of Appeals
for the Third Circuit

UNITED STATES COURT OF APPEALS
FOR THE THIRD CIRCUIT

No. 79-1445 and 79-1446

AMERICAN STERILIZER COMPANY,
Appellant in No. 79-1445

v.

SYBRON CORPORATION and CASTLE COMPANY
a division of Sybron Corporation,
Appellants in No. 79-1446

SUR PETITION FOR REHEARING

Present: SEITZ, *Chief Judge,* ALDISERT, ADAMS, GIBBONS, ROSENN, HUNTER, WEIS, GARTH, HIGGINBOTHAM, and SLOVITER, *Circuit Judges*

The petition for rehearing filed by
American Sterilizer Company

in the above entitled case having been submitted to the judges who participated in the decision of this court and to all the other available circuit judges of the circuit in regular active service, and no judge who concurred in the decision having asked for rehearing, and a majority of the circuit judges of the circuit in regular active service not having voted for rehearing by the court in banc, the petition for rehearing is denied.

By the Court,

/s/ MAX ROSENN
Max Rosenn
Judge

Dated: March 10, 1980